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Description of W.H.O.I. Rock Dredge Samples
Volume II

Edited by

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Approved for Distribution:

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ABSTRACT

This report is Volume II in the series of reports entitled "DESCRIPTIONS OF W.H.O.I. ROCK DREDGE SAMPLES". This volume represents the final step in the major effort to catalog and prepare initial descriptions for all rock dredge samples in the W.H.O.I. Sea Floor Samples Collection, and to distribute this information throughout the scientific community. The distribution of this report completes the initial description of the backlog of W.H.O.I. Dredge Samples. The data contained in this volume is an accumulation and transcription of initial descriptions made at sea, along with post-cruise descriptions performed at the lab by the curatorial staff.

Volume II contains individual stations executed during the period 1963 through 1986. It also presents a digitized listing of all dredge station data for the entire W.H.O.I. Dredge Collection through 1986. The data are sorted by Marsden Squares and can serve as a regional index for all rock descriptions included in Volumes I-III.

INTRODUCTION

A. Scope & Format of this Report

"Descriptions of W.H.O.I. Rock Dredge Samples" is an ongoing series of reports that present station data and detailed descriptions of the dredge samples in the W.H.O.I. Sea Floor Samples Collection.

The first three volumes in this series represent the completion of a major effort to describe the entire back-log of 790 dredge stations in the W.H.O.I. dredge collection as of 1986. Volume 1 includes a variety of cruises with a wide geographic distribution executed during the period 1960 to 1977 (Table 1). Many of the cruises in Volume I preceded the establishment of a central archiving facility in Woods Hole. The material in Volume I has been prepared by the W.H.O.I. curatorial staff who have painstakingly verified station locations and slabbed and described representative suites from each of these dredge hauls.

Volume III includes material collected from September 1978 - December 1980 and represents a new procedure where most of the descriptive work is executed onboard ship by participating scientists. As such, it represents a model for future dredging cruises and descriptive reports and, therefore, was prepared first (in May 1981). Volume II fills the gap and include the years 1966 through 1986.

This volume is organized alphabetically by research vessel and then chronologically within each of the vessels' many cruises. Each cruise "chapter" includes a generalized map of the ship's track, a digitized summary of the station location and samples recovered, and finally the detailed descriptions. Notes on the descriptive format and abbreviations used are provided in Table 2 (Notes on Detailed Rock Descriptions).

TABLE 1

CRUISE INDEX OF DESCRIPTIONS OF W.H.O.I. ROCK DREDGE SAMPLES, VOLUMES I-III

Cruise No.	General Location	Date
	VOLUME I	
ATLANTIS		
260	Hydrographer Canyon	Oct. '60
266	Blake Plateau	June '61
280	New England Seamounts	June '62
281	New England Seamounts	June '62
296	New England Seamounts	Aug. '63
ATLANTIS II		
1	Continental Slope off New York	Feb. '63
11	Puerto Rico Trench	July '64
13	Mid-Atlantic Ridge	Sept. '64
15	Bitter Lakes Regions-Suez Canal/Continental Slope of Ethiopia	Feb.-Mar. '65
42	Mid-Atlantic Ridge	July '68
73	Mid-Atlantic Ridge	Nov. '72
86	Continental Rise off Atlantis Canyon	Mar. '75
92	Median Valley, Mid-Atlantic Ridge	Sept. '75
Leg 6 93	Indian Ocean Triple Junction/Banda Sea	Feb., Oct. '76
96	Kane Fracture Zone	Nov. '77
CHAIN		
7	New England Seamounts	May '59
9	Plantagenet Bank (S. of Bermuda)	Oct. '59
11	Caribbean Sea	Feb. '60
13	Rockall Bank/Continental Slope of England	Sept. '60
19	Puerto Rico Trench	June '61
21	New England Seamounts/Mid-Atlantic Ridge	Aug. '61
34	Puerto Rico Trench	Dec. '62
36	Barracuda Fault	June '63
39	Abyssal Hills S.E. of Bermuda	Sept. '63
43	Seychelles (Indian Ocean)/Mid-Atlantic Ridge	May, Aug. '64
46	Mona Canyon/Blake Plateau	Feb. '65
52	Blake Plateau	Sept. '65
57	Puerto Rico Trench	April '66
58	Bermuda Rise	May '66
61	Mediterranean/Red Seas	Aug. '66
75	Caribbean-Aves Ridge, Mid-Atlantic Ridge	Oct. '67

TABLE 1 (Cont'd)

Cruise No.	General Location	Date
	VOLUME I (Cont'd)	
CHAIN (Cont'd)		
82	Mid-Atlantic Ridge	Aug. '68
100	Samoan Passage, Ninety East Ridge, Slope off Australia	Apr., Sept. '71
115	Bouvet Triple Junction	Feb. '74
119	Eastern Mediterranean Sea	Apr. '75
GOSNOLD		
73	Blake Plateau	July '65
97	Off Jamaica	Mar. '67
KNORR		
42	Mid-Atlantic Ridge	Aug. '74
54	Cayman Trough	Dec. '76
	VOLUME II	
ATLANTIS II		
32	Mid-Atlantic Ridge 42°-43°N	July '67
42	Romanche Fracture Zone	June '68
59	Mid-Atlantic Ridge	Dec. '70
60	Romanche Fracture Zone	June '71
78	Mid-Atlantic Ridge, Kane Fracture Zone	Oct. '73
85	New England Seamounts	Sept. '74
Leg 2 93	Walvis Ridge	Nov. '75
CHAIN		
35	St. Paul's Rocks	Mar. '63
44	Mid-Atlantic Ridge, 22°N	Oct. '64
105	King's Trough	July '72
GILLIS		
103	Mid-Atlantic Ridge	Aug. '78
107	Tamayo Fracture Zone	Oct. '79
ISLAS ORCADAS		
11/76	Far South Atlantic	Nov. '76

TABLE 1 (Cont'd)

Cruise No.	General Location	Date
	VOLUME II (Cont'd)	
KNORR		
61	New England Seamounts	Nov. '76
OCEANUS		
23	Cayman Trough	Apr. '77
RESEARCHER		
(Tag)	Mid-Atlantic Ridge	July '82
	VOLUME III	
ATLANTIS II		
107-6	Deep South Atlantic	Mar., Apr. '80
107-7	Deep South Atlantic	May '80
GILLIS		
104	Kane Fracture Zone	Sept. '78
KNORR		
79	Kane Fracture Zone	June '80
VULCAN		
5	Far South Atlantic	Dec. '80

B. Archiving Procedures

The standard format for archiving W.H.O.I. rock dredge samples is as follows: Each rock (and slabs derived from it) is labelled with the ship symbol, cruise number, and station number of the dredge haul, followed by a unique number for every rock within the dredge. For example, CHN 115 - 26 - 16 refers to rock 16 from station 26 of cruise Chain 115. Some samples are also labelled with their respective dredge numbers as well as with the information previously described. Thus AII 32-1-2-5 refers to rock number 5 from station number 1, dredge number 2 of cruise Atlantis II 32. The assignment of identification numbers for individual rocks from a given dredge station was done on a random basis. Thus rocks numbered in order do not necessarily possess similar lithologies.

In describing a dredge haul all specimens of reasonable size were sorted, and many were slabbed to obtain a fresh surface for description. If the dredge haul was very large and homogeneous, a representative suite of rocks was selected and described. All rock samples from this collection should be referenced in the literature by their Woods Hole identification number.

As a rule the station positions listed in this report approximate the beginning of the station or the best estimate between several fixes of the dredge's location during the station. The quality of these fixes vary with the accuracy and precision in ship positioning capabilities. In recent years the end depth or fix has been taken when the dredge leaves the sea floor, not where it actually arrives on deck. All depths included in this volume are given in corrected meters. More detailed navigation information such as additional fixes or length of wire-out during stations is available from the curator's office. Detailed sampling records (including names of investigators,

proposed analyses, and copies of published papers) are also kept at the curator's office.

C. Digitization of Dredge Sample Data

All logistical information about geological samples in the W.H.O.I. Sea Floor Samples Collection is stored on disc and is accessible through a rapid retrieval computer program. This data can also be obtained through the NGDC by writing to the following address or by calling them directly:

NGDC - National Geophysical Data Center
NOAA Code E/GC3
325 Broadway
Boulder, CO 80303

Commercial Tel. (303) 497-6338
F.T.S. Tel. 320-6338
Telex 45897 with answer back of SOLTERWARN BDR

These samples can be sorted and retrieved through a number of parameters such as Marsden Square, water depth interval, sampling device, lithology, physiographic province, as well as simply by cruise number. A semi-coded listing of all the dredge stations in the W.H.O.I. collection as of 1986 sorted by Marsden Square is included in Table 3. In addition, Table 1 is an index of the cruises, including dates and geographic areas which can be found in Volumes I-III (Description of W.H.O.I. Rock Dredge Samples).

The following summary explains the coded terms used in the computer listings of samples in this report:

Ship Codes:

ATL - Atlantis
AII - Atlantis II
CHN - Chain
GOS - Gosnold
GIL - Gillis
ISO - Islas Orcadas
KNR - Knorr
MEL - Melville - Vulcan Expedition
OCE - Oceanus
RES - Researcher

C. Digitization of Dredge Sample Data. (Cont'd)

Sample Recovery Devices:

07 - Pipe Dredge
08 - Chain Bag Dredge
09 - Anchor Dredge
10 - Pipe Dredge, 3 in.
11 - Pebble Dredge
12 - Pierce Dredge

Fix Types:

Types of navigational equipment used to determine the sample location are as follows:

00 - Unspecified - (Comment in REMARKS or on COMMENT CARD)
01 - Dead Reckoning
02 - Visual Bearing
03 - Radar Fix
04 - Celestial
05 - Loran A
06 - Loran C
07 - VLF
08 - Omega
09 - Satellite
10 - Radar Transponder Buoy
11 - Bottom Transponder
12 - Final Navigation File*

* Satellite fixes updated by continuous monitoring of ship's speed and heading via gravity acquisition system.

Dredge Weight (Recovery)

These are always quoted in kilograms unless the code specifically includes a G for grams (i.e. 010G = 10 grams).

Physiographic Province

A general physiographic location has been assigned to each of the samples listed, and can be decoded as follows:

01 - Insular Shelf
02 - Continental Shelf (along continental margin)
03 - Insular Slope
04 - Continental Slope
05 - Insular Rise
06 - Continental Rise
07 - Marginal Plateau or Borderland, deeper than 100 fms (e.g. Blake Plateau)
08 - unspecified
09 - Archipelagic Apron

C. Digitization of Dredge Sample Data. (Cont'd)

Physiographic Province (Cont'd)

10 - Abyssal Plain
11 - Abyssal Hills
12 - Seamount or Seamount Province
13 - Aseismic Oceanic Rise or Ridge (e.g., Rio Grande Rise, Walvis Ridge)
14 - Ridge Crest
15 - Ridge Flank
16 - Axial Valley
17 - Trench - Insular
18 - Trench - Continental Margin
19 - Fracture Zone
20 - Marginal Sea (e.g., Sea of Okhotsk, North Sea)
21 - Small Ocean Basin (e.g., Red Sea, Caribbean Sea)
22 - Inland Fresh Water Lake (e.g., African Lakes)
23 - Harbor, Shallow Bay (e.g., Buzzards Bay)
24 - Delta or Cone (e.g., Amazon Cone)
25 - Submarine Canyon (e.g., Hudson Canyon)
26 - Mid-Ocean Canyon or Channel (e.g., Maury Channel, N. Atlantic Mid-Ocean Canyon)
99 - Unspecified: (Comment in REMARKS or on a COMMENT CARD)

Rock Types and Vita Code

These columns have not been coded as they are undergoing some revision in order to be more descriptive of rock samples.

D. Sample Distribution Policy

The W.H.O.I. Sea Floor Samples Laboratory is prepared to furnish samples and data to intertested researchers and students within the scientific community who express a legitimate interest and need.

Requests for samples may be sent to the Geological Sample Curator's Office, McLean Laboratory, W.H.O.I., Woods Hole, MA 02543. These should include a summary of the intended research and the laboratory facilities available. Requests will be reviewed by the Principal Investigator responsible for collecting the samples, and may be approved if the proposed studies are not in conflict with concurrent laboratory studies. The Principal

D. Sample Distribution Policy. (Cont'd)

Investigator will retain authority to approve sample requests until expiration of the relevant research grant or until two years from the date of termination of the cruise. Following the period of proprietary access, sample requests will be approved by the Curator's office in consultation with the appropriate staff scientists.

Persons obtaining samples will also be given a statement explaining the "Responsibilities of Persons Receiving Samples" (Part E). Further documentation regarding this distribution policy may be found in W.H.O.I. Institutional Memorandum #3-75 ("Distribution Policy for Geological Samples").

E. Responsibilities of Persons Receiving Samples.

1. The original alpha-numeric samples label should be used in published papers, or any departure from this scheme should be clearly equated with the original labeling system in published papers or data summaries. This labeling system will be explained in the information supplied with the samples.
2. Published papers should acknowledge the source of samples and the appropriate grant or funding agency which supported the cruise recovering the samples. This information will be supplied at the time the samples are sent. These papers should also acknowledge the financial support responsible for maintaining the Woods Hole geological samples (NSF Grant OCE85-19889).
3. Copies of all published papers, reports or data summaries utilizing Woods Hole samples should be sent to the appropriate W.H.O.I. staff scientist and the W.H.O.I. curator.

E. Responsibilities of Persons Receiving Samples. (Cont'd)

4. The researcher should return all unused samples or portions of samples to the curator at the completion of his work.

5. Recipients of samples should not co-opt the services of other investigators or undertake research projects which differ substantially from work originally proposed, without obtaining the approval of the curator and the appropriate staff scientist.

ACKNOWLEDGEMENTS

The editors of this report would like to recognize all those persons contributing to the rock descriptions provided herein (especially D. Bergersen and L. Peirson). We also wish to thank other members of the W.H.O.I. Curatorial Staff for their persistence in carrying out routine archival procedures which maintain the high quality of this collection. (David A. Johnson provided much of the guidance and drive for this effort through the years.) Alice Tricca did a great job typing the complex forms. Support for the preparaton of this report was provided by a grant to the Woods Hole Oceanographic Institution, Sea Floor Samples Laboratory (National Science Foundation Grant No. (OCE85-19889). The petrologists on the scientific staff at Woods Hole (W. Bryan, G. Thompson, H. Dick, P. Meyer, S. Humphris, and M. Mottl) have been of continuing assistance to us in providing logistical and descriptive information from their respective shipboard programs, and in implementing an effective sample distribution policy.

TABLE 2

NOTES ON DETAILED ROCK DESCRIPTIONS

Lithology: Rock name; i.e. Basalt, Gabbro, Greenstone, etc.

Wt.: Weight in kilograms

G.S.: Grain size: G = glassy
A = aphanitic; individual grains not visible to the naked eye
F = fine; <1mm
M = medium; 1 to 5mm
C = coarse; >5 mm

Mineralogy: Phases present in groundmass if apparent in hand specimen

Phenocrysts: Type and estimated amount in %; use abbreviations:

Pg - Plagioclase, Px - Pyroxene, Amph - Amphibole,
Mt - Magnetite, Py - Pyrite, Ol - Olivine,
Il - Ilmenite, Ep - Epidote, Pr - Prehnite, Mi - Mica,
Hb or Hnbl - Hornblende, Fs - Feldspar, etc.

Ve: Vesicles - give an estimate of the percent in the rock

Am: Amygdules - filled vugs or vesicles; estimate abundance:

T - trace S - scattered
C - common A - abundant

Mn: Manganese coating - give thickness (in mm)

We: Weathering F - Fresh, no discoloration
L - Light, discolored at edges
M - Moderately discolored
H - Heavy, clayey
VH - Very Heavy, disaggregating

Alteration: Metamorphism - facies and degrees

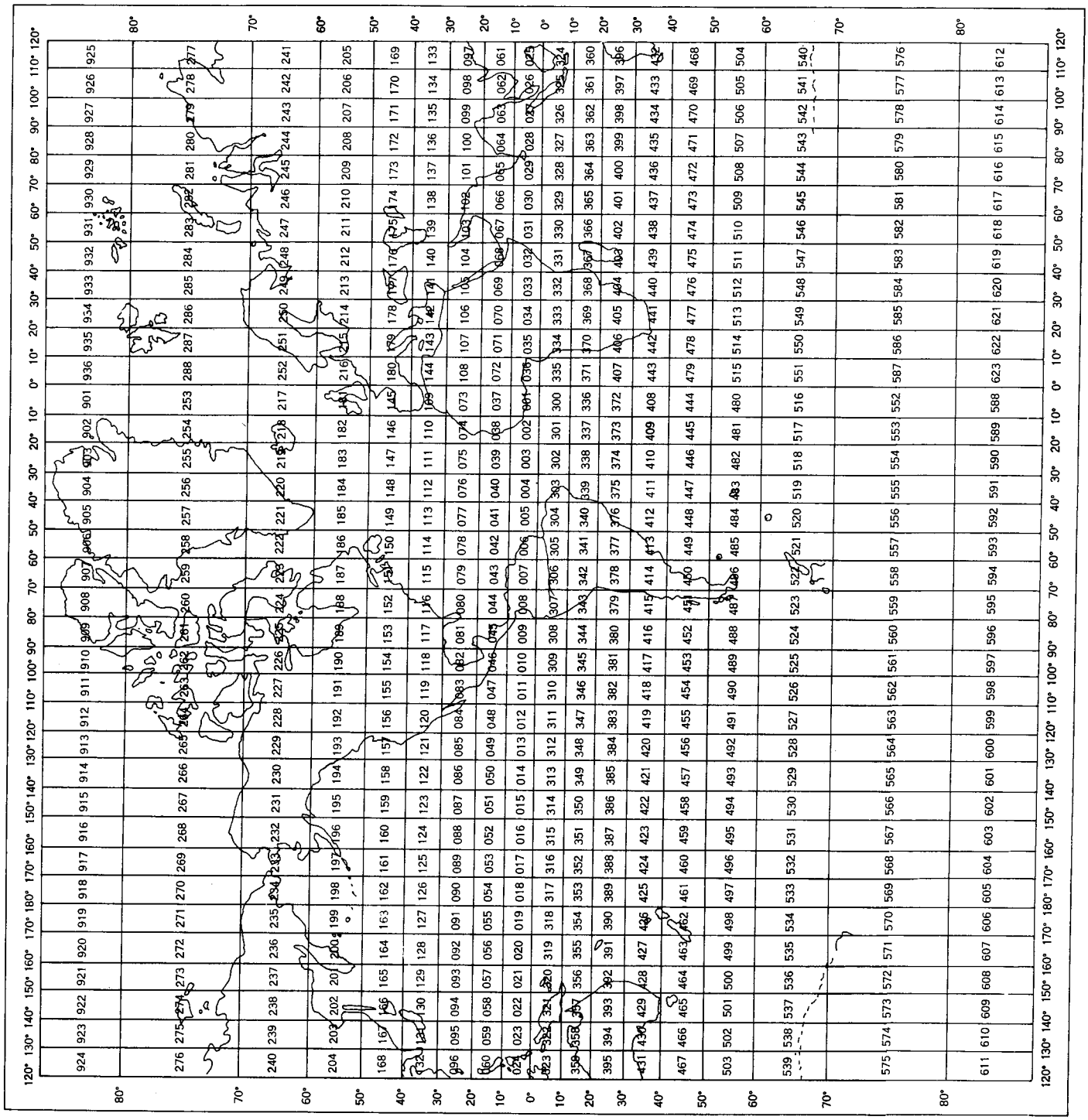
i.e. Ze - Zeolite (prehnite - pumpellyite)
Gr - Greenschist
Amph - Amphibolite
Gran. - Granulite

Remarks: Note if glass is present, indicate visible structures (internal or external), and describe distinct morphologies. For example: "pillow rind fragments".

TABLE 3

COMPUTER LISTING OF W.H.O.I. DREDGES,

ARRANGED BY MARSDEN SQUARES



WOODS HOLE OCEANOGRAPHIC INSTITUTION

STATION DATA RETRIEVAL FILE

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
							MARSDEN SQUARE # 2										
AII	20	2	0013	0000	8	66 310	0 20.0'N	16 56.0'W	1	2.06	0013	5175.	5155.	004K	19	0000	0
AII	20	2	0014	0000	8	66 310	0 24.0'N	16 55.0'W	1	2.06	0014	3850.	2365.	002K	19	0000	0
AII	20	2	0016	0000	8	66 311	0 13.0'N	17 9.0'W	1	2.07	0016	5000.	4045.		19	0000	0
AII	60	6	0018	0000	8	71 625	0 9.0'N	17 17.0'W	9	2.07	0018	5675.	5186.	500G	19	0000	0
AII	60	6	0019	0000	8	71 626	0 9.0'N	17 19.0'W	9	2.07	0019	5960.	5186.	023K	19	0000	0
AII	60	6	0020	0000	8	71 626	0 13.0'N	17 18.0'W	9	2.07	0020	3996.	3558.	500G	19	0000	0
AII	60	6	0021	0000	8	71 626	0 24.0'N	17 20.0'W	9	2.07	0021	2237.	1714.	045K	19	0000	0
AII	60	6	0022	0000	8	71 627	0 18.0'N	17 2.0'W	9	2.07	0022	4243.	2034.	002K	19	0000	0
AII	60	6	0023	0000	8	71 627	0 19.0'N	17 8.0'W	9	2.07	0023	4417.	3938.	250G	19	0000	0
AII	60	6	0014	0000	8	71 624	0 5.0'N	18 17.0'W	9	2.08	0014	2800.	2519.	500G	19	0000	0
							MARSDEN SQUARE # 3										
CHN	35	2	0008	0000	8	63 3 8	0 57.0'N	28 22.0'W	1	3.08	0008	3219.	3219.	6.5K	15	0000	0
AII	20	2	0024	0000	8	66 318	0 50.2'N	29 20.2'W	2	3.09	0024	3025.	1875.		99	0000	0
AII	20	2	0025	0000	8	66 318	0 51.8'N	29 20.3'W	2	3.09	0025	2345.	1590.		99	0000	0
AII	20	2	0028	0000	7	66 319	0 56.4'N	29 19.8'W	2	3.09	0028	205.	225.		99	0000	0
AII	20	2	0029	0000	7	66 319	0 56.1'N	29 22.1'W	2	3.09	0029	0.	0.		99	0000	0
AII	20	2	0030	0000	7	66 319	0 56.1'N	29 21.9'W	2	3.09	0030	28.	47.		99	0000	0
AII	20	2	0031	0000	7	66 319	0 56.0'N	29 21.8'W	2	3.09	0031	160.	120.		99	0000	0
AII	20	2	0036	0000	8	66 321	0 58.1'N	29 25.7'W	2	3.09	0036	2550.	1500.		99	0000	0
AII	20	2	0037	0000	7	66 322	0 56.0'N	29 22.4'W	2	3.09	0037	115.	30.		99	0000	0
AII	20	2	0038	0000	7	66 322	0 55.3'N	29 22.5'W	2	3.09	0038	485.	135.		99	0000	0
AII	20	2	0039	0000	8	66 322	0 49.7'N	29 25.7'W	2	3.09	0039	2625.	1875.		99	0000	0
AII	20	2	0040	0000	8	66 322	0 52.8'N	29 26.3'W	2	3.09	0040	1590.	1410.		99	0000	0
AII	20	2	0041	0000	8	66 323	0 56.9'N	29 24.3'W	2	3.09	0041	1480.	1160.		99	0000	0
AII	20	2	0042	0000	8	66 323	0 49.4'N	29 23.0'W	2	3.09	0042	2810.	2110.		99	0000	0
AII	20	2	0044	0000	8	66 324	0 51.2'N	29 14.0'W	2	3.09	0044	3095.	2360.		99	0000	0
AII	20	2	0047	0000	8	66 325	0 47.6'N	29 28.3'W	2	3.09	0047	3570.	2910.		99	0000	0
AII	20	2	0048	0000	8	66 325	0 54.4'N	29 29.0'W	2	3.09	0048	3170.	2550.		99	0000	0
CHN	35	2	0007	0000	8	63 3 7	0 54.0'N	29 23.0'W	1	3.09	0007	1109.	1109.	107K	15	0000	0
CHN	35	2	0015	0000	7	63 317	0 56.4'N	29 21.5'W	1	3.09	0015	300.	300.	2.7K	14	0000	0
CHN	35	2	0016	0000	7	63 317	0 55.6'N	29 22.5'W	1	3.09	0016	113.	113.	3.7K	14	0000	0
CHN	35	2	0018	0000	8	63 318	0 55.0'N	29 20.0'W	1	3.09	0018	1113.	1113.	142K	14	0000	0
AII	20	2	0026	0000	8	66 318	1 1.0'N	29 18.5'W	2	3.19	0026	2410.	1875.		99	0000	0
AII	20	2	0027	0000	8	66 318	1 0.0'N	29 17.0'W	2	3.19	0027	1925.	1540.		99	0000	0
AII	20	2	0035	0000	8	66 321	1 0.5'N	29 42.5'W	9	3.19	0035	3665.	2360.		99	0000	0
AII	20	2	0043	0000	8	66 323	1 2.6'N	29 19.5'W	2	3.19	0043	3200.	2020.		99	0000	0

MARSDEN SQUARE # 3

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	20	2	0045	0000	8	66 324	1 0.2'N	29 26.6'W	2	3.19	0045	3380.	2560.		99	0000	0
AII	20	2	0046	0000	8	66 324	1 2.7'N	29 21.9'W	2	3.19	0046	3490.	2620.		99	0000	0

MARSDEN SQUARE # 4

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	20	2	0032	0000	8	66 320	0 49.5'N	30 7.0'W	9	4.00	0032	3570.	2455.		99	0000	0
AII	20	2	0033	0000	8	66 320	0 54.0'N	30 6.5'W	9	4.00	0033	2720.	2300.		99	0000	0
AII	20	2	0034	0000	8	66 321	0 55.0'N	30 17.0'W	9	4.00	0034	2815.	2470.		99	0000	0
CHN	35	2	0001	0000	8	63 3 5	0 33.0'N	32 47.0'W	1	4.02	0001	4291.	4291.	0000	15	0000	0
CHN	35	2	0002	0000	8	63 3 5	0 34.0'N	32 55.0'W	1	4.02	0002	3929.	3929.	4.8K	15	0000	0
CHN	35	2	0019	0000	7	63 319	0 44.0'N	34 47.0'W	1	4.04	0019	4072.	4072.	037K	6	0000	0

MARSDEN SQUARE # 5

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	35	3	0020	0000	12	63 4 0	7 33.0'N	44 59.0'W	1	5.74	0020	4663.	4663.	0000	6	0000	0
AII	20	3	0058	0000	8	66 419	9 36.0'N	40 35.5'W	9	5.90	0058	3340.	2475.		19	0000	0

MARSDEN SQUARE # 6

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	35	3	0021	0000	12	63 4 0	5 33.0'N	51 21.0'W	1	6.51	0021	91.	91.	001K	2	0000	0
CHN	35	3	0022	0000	12	63 4 0	5 28.0'N	51 38.0'W	1	6.51	0022	72.	72.	0000	2	0000	0
CHN	35	3	0023	0000	12	63 4 0	5 32.2'N	51 33.0'W	1	6.51	0023	62.	62.	0000	2	0000	0
CHN	35	3	0024	0000	12	63 4 0	5 31.0'N	52 7.0'W	1	6.52	0024	57.	57.	004K	2	0000	0
CHN	35	3	0025	0000	12	63 4 0	5 28.0'N	52 19.0'W	1	6.52	0025	41.	41.	0000	2	0000	0
CHN	35	3	0026	0000	12	63 4 0	5 39.0'N	52 39.0'W	1	6.52	0026	38.	38.	0000	2	0000	0
CHN	35	3	0027	0000	12	63 4 0	6 6.0'N	55 12.5'W	1	6.55	0027	26.	26.	0000	2	0000	0
CHN	35	3	0030	0000	12	63 4 0	6 41.0'N	54 52.5'W	1	6.64	0030	38.	38.	0000	2	0000	0
CHN	35	3	0031	0000	12	63 4 0	6 52.0'N	54 46.0'W	1	6.64	0031	53.	53.	0000	2	0000	0
CHN	35	3	0028	0000	12	63 4 0	6 20.0'N	55 4.0'W	1	6.65	0028	20.	20.	0000	2	0000	0
CHN	35	3	0032	0000	12	63 4 0	7 4.0'N	54 39.0'W	1	6.74	0032	70.	70.	0000	2	0000	0

MARSDEN SQUARE # 31

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	43	1	0008	0000	8	64 4 4	5 35.5'N	54 3.0'E	1	31.54	0004	4711.	3285.	5.4K	19	0000	0
AII	15	4	0556	0000	10	65 223	9 0.0'N	51 5.0'E	9	31.91	0556	977.	0.	113G	4	0000	0
AII	15	4	0557	0000	10	65 3 1	9 0.0'N	51 25.0'E	9	31.91	0557	2580.	0.	456G	4	0000	0

MARSDEN SQUARE # 41

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	20	3	0059	0000	8	66 422	10 41.0'N	42 32.0'W	9	41.02	0059	4910.	4140.		19	0000	0
AII	20	1	0001	0000	8	66 216	10 51.0'N	43 41.0'W	1	41.03	0001	5100.	3375.	100G	19	0000	0
AII	20	1	0007	0000	8	66 213	10 35.0'N	43 34.0'W	1	41.03	0007	3000.	2270.		19	0000	0
AII	20	1	0009	0000	8	66 220	10 45.0'N	43 18.0'W	1	41.03	0009	4990.	3490.		19	0000	0
AII	20	1	0003	0000	8	66 216	11 5.0'N	43 42.0'W	1	41.13	0003	4750.	3420.		19	0000	0
AII	20	1	0004	0000	8	66 217	11 16.0'N	43 45.0'W	1	41.13	0004	4365.	3950.		19	0000	0

MARSDEN SQUARE # 41

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	20	1	0005	0000	8	66 218	11 15.0'N	43 47.0'W	1	41.13	0005	3605.	3035.		19	0000	0
AII	20	1	0006	0000	8	66 218	11 19.0'N	43 41.0'W	1	41.13	0006	4460.	3095.		19	0000	0
AII	20	1	0008	0000	8	66 219	11 0.0'N	44 5.0'W	1	41.14	0008	4790.	3910.		19	0000	0
CHN	75	2	0021	0000	8	671121	12 50.3'N	44 42.2'W	10	41.24	0003	2126.	1585.	8.8K	14	0000	0
CHN	75	2	0022	0000	8	671121	12 52.7'N	44 50.9'W	10	41.24	0004	4630.	4438.	340G	16	0000	0
CHN	75	2	0027	0000	8	671122	12 58.0'N	44 41.1'W	10	41.24	0009	3256.	3049.	454G	14	0000	0
CHN	75	2	0026	0000	8	671122	12 55.8'N	44 59.8'W	10	41.25	0008	2784.	2841.	009K	14	0000	0
CHN	75	2	0023	0000	8	671121	12 58.4'N	44 51.3'W	10	41.34	0005	4581.	4515.	227G	16	0000	0
CHN	75	2	0025	0000	8	671122	12 58.8'N	44 58.5'W	10	41.34	0007	2333.	3162.	012K	14	0000	0
AII	42	1	0018	0000	8	68 713	19 27.8'N	46 5.6'W	3	41.96	0001	2861.	2861.	010K	16	0000	0
AII	42	1	0019	0000	8	68 713	19 32.3'N	46 6.1'W	1	41.96	0002	2278.	2278.	7.5K	16	0000	0

MARSDEN SQUARE # 42

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	36	1	0017	0000	8	63 630	16 43.0'N	58 6.0'W	1	42.68	0005	5065.	4274.	051K	17	0000	0

MARSDEN SQUARE # 43

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	75	1	0005	0000	8	671030	14 42.5'N	63 36.5'W	4	43.43	0002	1239.	1454.	6.6K	13	0000	0
CHN	75	1	0003	0000	8	671029	15 29.0'N	64 5.0'W	4	43.53	0001	1086.	1215.	454G	13	0000	0
CHN	11	3	0038	0000	7	60 222	17 45.0'N	64 55.0'W	4	43.74	0038	755.	942.	2.1K	3	0000	0
CHN	46	1	0002	0000	8	65 222	18 49.9'N	67 19.3'W	5	43.87	0001	3572.	3288.	005K	25	0000	0
CHN	46	1	0003	0000	8	65 222	18 47.5'N	67 22.8'W	5	43.87	0002	4830.	4801.	004K	25	0000	0
CHN	46	1	0005	0000	8	65 223	18 49.2'N	67 28.6'W	5	43.87	0003	4318.	3723.	680G	25	0000	0
CHN	57	1	0027	0000	8	66 4 4	19 58.8'N	64 15.2'W	5	43.94	0002	6710.	6572.	227G	17	0000	0
AII	11	2	0026	0000	8	64 7 9	19 59.0'N	65 14.0'W	5	43.95	0005	7244.	7190.	027K	5	0000	0
AII	11	2	0028	0000	8	64 7 9	19 59.5'N	65 1.7'W	5	43.95	0006	7942.	7662.	5.9K	5	0000	0
AII	11	2	0032	0000	8	64 711	19 17.7'N	65 10.4'W	5	43.95	0010	7023.	6729.	030K	5	0000	0
AII	11	2	0033	0000	8	64 711	19 16.9'N	65 5.3'W	5	43.95	0011	6749.	6513.	007K	5	0000	0
AII	11	2	0034	0000	8	64 712	19 4.6'N	66 9.0'W	5	43.96	0012	4983.	4105.	2.9K	5	0000	0
CHN	19	1	0002	0000	8	61 628	19 58.4'N	66 25.2'W	5	43.96	0002	6987.	6594.	567G	17	0000	0
CHN	19	1	0003	0000	8	61 628	19 58.4'N	66 25.7'W	5	43.96	0003	6968.	6544.	020K	17	0000	0
CHN	34	1	0002	0000	8	6212 3	19 57.0'N	66 28.5'W	5	43.96	0002	7362.	7362.	001K	17	0000	0
CHN	57	1	0033	0000	8	66 4 7	19 47.8'N	67 8.7'W	5	43.97	0004	7912.	7667.	340G	17	0000	0
CHN	57	1	0034	0000	7	66 4 7	19 58.0'N	68 4.0'W	5	43.98	0003	5690.	5612.	004K	17	0000	0

MARSDEN SQUARE # 44

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
GOS	97	0	0006	0000	7	67 315	17 47.1'N	76 17.0'W	1	44.76	0006	738.	0.	450G	3	0000	0
GOS	97	0	0026	0000	7	67 317	17 43.0'N	76 54.0'W	1	44.76	0026	0.	0.	450G	1	0000	0
GOS	97	0	0038	0000	7	67 318	17 55.0'N	77 5.2'W	1	44.76	0038	460.	0.	790G	3	0000	0
GOS	97	0	0016	0000	7	67 316	17 51.6'N	77 4.5'W	1	44.77	0016	10.	0.	450G	1	0000	0
GOS	97	0	0018	0000	7	67 316	17 46.0'N	77 4.3'W	1	44.77	0018	20.	0.	500G	1	0000	0
GOS	97	0	0020	0000	7	67 316	17 36.8'N	77 4.0'W	1	44.77	0020	25.	0.	567G	1	0000	0
GOS	97	0	0021	0000	7	67 316	17 40.3'N	77 7.9'W	1	44.77	0021	0.	0.	254G	1	0000	0
GOS	97	0	0024	0000	7	67 317	17 38.1'N	76 50.1'W	1	44.77	0024	0.	0.	925G	1	0000	0
GOS	97	0	0047	0000	7	67 321	17 55.5'N	77 52.4'W	1	44.77	0047	0.	0.	001K	3	0000	0

MARSDEN SQUARE # 44

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
GOS	97	0	0048	0000	7	67 321	17 52.5'N	77 50.0'W	1	44.77	0048	0.	0.	1.6K	3	0000	0
GOS	97	0	0049	0000	7	67 321	17 52.1'N	77 48.1'W	1	44.77	0049	0.	0.	1.8K	3	0000	0
GOS	97	0	0050	0000	7	67 321	17 49.8'N	77 45.0'W	1	44.77	0050	0.	0.	900G	3	0000	0
GOS	97	0	0066	0000	7	67 322	17 50.0'N	77 39.8'W	1	44.77	0066	0.	0.	900G	3	0000	0
GOS	97	0	0030	0000	7	67 317	18 4.1'N	76 15.0'W	1	44.86	0030	698.	0.	908G	1	0000	0
GOS	97	0	0033	0000	7	67 317	18 1.7'N	76 16.1'W	1	44.86	0033	322.	0.	450G	3	0000	0
GOS	97	0	0042	0000	7	67 320	18 0.5'N	77 57.1'W	1	44.87	0042	18.	0.	340G	1	0000	0
GOS	97	0	0043	0000	7	67 321	18 0.6'N	77 58.0'W	1	44.87	0043	42.	0.	001K	1	0000	0
GOS	97	0	0044	0000	7	67 321	18 0.5'N	77 59.1'W	1	44.87	0044	597.	0.	675G	3	0000	0

MARSDEN SQUARE # 45

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
KNR	54	2	0042	0000	8	76 130	17 58.0'N	81 47.6'W	9	45.71	0020	4630.	4459.	195K	17	0000	0
KNR	54	2	0046	0000	8	76 131	17 59.8'N	81 45.5'W	9	45.71	0023	4623.	4397.	206K	17	0000	0
KNR	54	2	0054	0000	8	76 2 3	17 59.1'N	81 34.4'W	9	45.71	0029	2047.	1956.	002K	17	0000	0
OCE	23	1	0004	0000	8	77 4 9	17 56.5'N	81 45.0'W	1	45.71	0004	4846.	4943.	30K	16	0000	0
OCE	23	1	0005	0000	8	77 4 9	17 54.6'N	81 41.0'W	9	45.71	0005	5516.	4346.	39K	16	0000	0
OCE	23	1	0008	0000	8	77 410	17 51.0'N	81 52.0'W	1	45.71	0008	3268.	3268.	20K	16	0000	0
OCE	23	1	0009	0000	8	77 410	17 48.2'N	81 54.2'W	9	45.71	0009	5026.	3916.	15K	16	0000	0
OCE	23	1	0016	0000	8	77 412	17 53.0'N	81 50.0'W	1	45.71	0016	4123.	3916.	15K	16	0000	0
KNR	54	2	0002	0000	8	76 115	18 2.6'N	81 43.1'W	9	45.81	0000	4795.	4824.	089K	17	0000	0
KNR	54	2	0011	0000	8	76 118	18 0.1'N	81 36.8'W	9	45.81	0003	2855.	2597.	042K	17	0000	0
KNR	54	2	0012	0000	8	76 119	18 3.6'N	81 37.3'W	9	45.81	0004	3484.	3728.	016K	17	0000	0
KNR	54	2	0013	0000	8	76 119	18 5.9'N	81 42.2'W	9	45.81	0005	4514.	4619.		17	0000	0
KNR	54	2	0014	0000	8	76 119	18 3.4'N	81 41.9'W	9	45.81	0006	4324.	4369.	1.8K	17	0000	0
KNR	54	2	0023	0000	8	76 123	18 4.4'N	81 47.8'W	9	45.81	0008	4892.	5103.	086K	17	0000	0
KNR	54	2	0024	0000	8	76 123	18 7.0'N	81 46.8'W	9	45.81	0009	5011.	5066.	061K	17	0000	0
KNR	54	2	0026	0000	8	76 124	18 4.4'N	81 48.8'W	9	45.81	0010	4001.	4459.	355K	17	0000	0
KNR	54	2	0027	0000	8	76 124	18 1.2'N	81 48.6'W	9	45.81	0011	4413.	4369.	084K	17	0000	0
KNR	54	2	0029	0000	8	76 125	18 3.6'N	81 46.8'W	9	45.81	0012	4956.	4683.	019K	17	0000	0
KNR	54	2	0030	0000	8	76 125	18 5.4'N	81 44.9'W	9	45.81	0013	5411.	4892.	026K	17	0000	0
KNR	54	2	0033	0000	8	76 126	18 5.8'N	81 42.6'W	9	45.81	0014	4874.	4911.	047K	17	0000	0
KNR	54	2	0037	0000	8	76 128	18 5.7'N	81 46.6'W	9	45.81	0017	5157.	4403.	304K	17	0000	0
KNR	54	2	0039	0000	8	76 129	18 6.9'N	81 45.4'W	9	45.81	0018	5502.	5157.	034K	17	0000	0
KNR	54	2	0040	0000	8	76 129	18 1.6'N	81 46.3'W	9	45.81	0019	4828.	4892.	034K	17	0000	0
KNR	54	2	0044	0000	8	76 130	18 1.6'N	81 44.9'W	9	45.81	0022	4610.	4486.	136K	17	0000	0
KNR	54	2	0047	0000	8	76 131	18 6.0'N	81 47.6'W	9	45.81	0024	5075.	4499.	062K	17	0000	0
KNR	54	2	0048	0000	8	76 131	18 6.9'N	81 46.6'W	9	45.81	0025	5212.	4568.	022K	17	0000	0
KNR	54	2	0051	0000	8	76 2 2	18 7.3'N	81 43.0'W	9	45.81	0027	5684.	5575.	072K	17	0000	0
KNR	54	2	0052	0000	8	76 2 2	18 7.3'N	81 46.0'W	9	45.81	0028	5393.	5474.	007K	17	0000	0
KNR	54	2	0058	0000	8	76 2 3	18 7.6'N	81 43.8'W	9	45.81	0031	5329.	4965.	063K	17	0000	0
KNR	54	2	0062	0000	8	76 2 4	18 25.0'N	81 40.8'W	1	45.81	0033	4665.	3913.	048K	17	0000	0
KNR	54	2	0063	0000	8	76 2 5	18 35.7'N	81 41.3'W	9	45.81	0034	5123.	4628.	145K	17	0000	0
KNR	54	3	0067	0000	8	76 210	18 38.7'N	81 12.6'W	9	45.81	0035	4118.	3438.	4.3K	17	0000	0
KNR	54	3	0071	0000	8	76 211	18 45.9'N	81 35.0'W	9	45.81	0037	5292.	4628.	090K	17	0000	0
KNR	54	3	0073	0000	8	76 212	18 56.6'N	81 31.3'W	9	45.81	0038	4701.	4568.	036K	17	0000	0
KNR	54	3	0074	0000	8	76 212	18 49.0'N	81 32.8'W	9	45.81	0039	5657.	3529.	062K	17	0000	0
KNR	54	3	0090	0000	8	76 216	18 37.0'N	81 44.0'W	1	45.81	0090	4755.	5283.	072K	17	0000	0
KNR	54	3	0094	0000	8	76 218	18 35.2'N	81 46.2'W	1	45.81	0043	5084.	5178.	146K	17	0000	0

MARSDEN SQUARE # 45

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
KNR	54	3	0098	0000	8	76 219	18 25.9'N	81 41.2'W	9	45.81	0045	5084.	4373.	083K	17	0000	0
KNR	54	3	0102	0000	8	76 220	18 44.8'N	81 48.5'W	9	45.81	0046	6142.	6097.	2.4K	17	0000	0
KNR	54	3	0103	0000	8	76 220	18 37.6'N	81 44.8'W	9	45.81	0103	5176.	5100.	012K	17	0000	0
OCE	23	1	0001	0000	8	77 4 7	18 19.3'N	81 23.0'W	9	45.81	0001	4386.	4386.	30K	16	0000	0
OCE	23	1	0011	0000	8	77 411	18 10.7'N	81 46.0'W	9	45.81	0011	5640.	5420.	45K	16	0000	0
OCE	23	1	0012	0000	8	77 411	18 5.1'N	81 44.7'W	9	45.81	0012	5667.	5132.	50K	16	0000	0
OCE	23	1	0013	0000	8	77 412	18 10.4'N	81 37.2'W	9	45.81	0013	4495.	4495.	28K	16	0000	0
OCE	23	1	0014	0000	8	77 412	18 13.1'N	81 32.2'W	9	45.81	0014	3373.	3373.	20K	16	0000	0
OCE	23	1	0017	0000	8	77 413	18 16.9'N	81 51.3'W	9	45.81	0017	3989.	3445.	1K	16	0000	0
KNR	54	3	0091	0000	8	76 217	18 35.1'N	82 8.1'W	9	45.82	0042	4683.	4985.	075K	17	0000	0

MARSDEN SQUARE # 68

CHN	43	1	0070	0000	8	64 6 5	16 4.0'N	41 25.0'E	5	68.61	0025	1175.	1136.	707G	21	0000	0
CHN	43	1	0006	0000	8	64 326	17 38.0'N	40 8.0'E	5	68.70	0003	1378.	1194.	002G	16	0000	0
CHN	43	1	0073	0000	8	64 6 9	17 50.0'N	40 12.0'E	5	68.70	0028	1203.	1203.	227G	21	0000	0

MARSDEN SQUARE # 69

CHN	100	3	0006	0000	8	71 3 5	19 38.4'N	38 36.2'E	9	69.98	0001	1831.	1739.	227G	16	0000	0

MARSDEN SQUARE # 75

CHN	21	1	0008	0000	8	61 9 8	29 49.0'N	28 40.0'W	1	75.98	0008	462.	462.	454G	12	0000	0
CHN	21	1	0010	0000	8	61 9 8	29 49.0'N	28 40.0'W	1	75.98	0010	349.	340.	113G	12	0000	0
CHN	21	1	0011	0000	8	61 9 8	29 49.0'N	28 40.0'W	1	75.98	0011	321.	317.	6.8K	12	0000	0
CHN	21	1	0013	0000	8	61 9 8	29 47.0'N	28 19.0'W	1	75.98	0013	589.	591.	3.6K	12	0000	0
CHN	21	1	0014	0000	8	61 9 8	29 47.0'N	28 20.0'W	1	75.98	0014	393.	358.	003K	12	0000	0
CHN	21	1	0015	0000	8	61 9 8	29 46.3'N	28 19.0'W	1	75.98	0015	871.	832.	3.3K	12	0000	0

MARSDEN SQUARE # 77

CHN	44	1	0002	0000	8	641014	22 38.0'N	44 58.0'W	1	77.24	0002	2440.	2100.	008K	15	0000	0
AII	78	2	0007	0000	8	731019	22 59.0'N	45 42.0'W	9	77.25	0007	3445.	3000.	016K	15	0000	0
AII	78	2	0008	0000	8	731019	22 58.0'N	45 51.0'W	9	77.25	0008	3570.	3200.	110K	15	0000	0
AII	78	2	0009	0000	8	731020	22 58.0'N	45 56.0'W	9	77.25	0009	3860.	2910.	023K	15	0000	0
CHN	44	1	0003	0000	8	641014	22 38.0'N	45 0.7'W	1	77.25	0003	3400.	2400.	111K	15	0000	0
CHN	44	1	0005	0000	8	641014	22 48.3'N	45 38.2'W	1	77.25	0005	3150.	3050.	011K	15	0000	0
CHN	44	1	0006	0000	7	641017	22 46.8'N	46 10.8'W	1	77.25	0006	4400.	4100.	011K	15	0000	0
CHN	44	1	0008	0000	7	641018	22 50.0'N	45 5.6'W	1	77.25	0008	3400.	3200.	010K	15	0000	0
CHN	44	1	0007	0000	7	641017	22 48.8'N	46 5.3'W	1	77.26	0007	4040.	3765.	001K	15	0000	0
CHN	44	1	0010	0000	7	641020	22 24.2'N	46 22.8'W	1	77.26	0010	3400.	3100.	010K	15	0000	0
AII	96	3	0012	0000	8	771117	23 31.1'N	43 54.4'W	0	77.33	0012	4039.	3326.	088K	19	0000	0
GIL	104	1	0019	0000	8	78 911	23 30.9'N	44 58.9'W	9	77.33	0019	4240.	3980.	245K	16	0000	0
AII	78	2	0001	0000	8	731015	23 13.0'N	44 43.0'W	9	77.34	0001	3090.	2325.	027K	15	0000	0
AII	78	2	0002	0000	8	731015	23 14.0'N	44 42.0'W	9	77.34	0002	2965.	2360.	006K	15	0000	0

MARSDEN SQUARE # 77

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	78	2	0003	0000	8	731015	23 13.0'N	44 55.0'W	9	77.34	0003	3990.	3380.	200K	15	0000	0
AII	92	2	0030	0000	8	7510 6	23 2.4'N	44 53.4'W	12	77.34	0006	3231.	3554.	037K	16	0000	0
AII	92	2	0031	0000	8	7510 6	23 1.8'N	44 55.4'W	12	77.34	0007	3589.	3516.	160K	16	0000	0
AII	96	3	0009	0000	8	771116	23 36.5'N	44 28.7'W	0	77.34	0009	3982.	2737.	500G	19	0000	0
AII	96	3	0010	0000	8	771117	23 38.3'N	44 29.2'W	0	77.34	0010	2578.	2287.	029K	19	0000	0
AII	96	3	0013	0000	8	771118	23 36.0'N	44 57.9'W	0	77.34	0013	6180.	4049.	096K	19	0000	0
AII	96	3	0018	0000	8	771124	23 31.5'N	44 49.1'W	0	77.34	0018	3686.	3573.	005K	19	0000	0
GIL	104	1	0013	0000	8	78 9 9	23 39.2'N	44 59.3'W	9	77.34	0013	4870.	4260.	143K	16	0000	0
GIL	104	1	0017	0000	8	78 910	23 37.2'N	45 2.1'W	9	77.34	0017	4820.	4410.	120K	19	0000	0
GIL	104	1	0025	0000	8	78 914	23 32.0'N	44 57.4'W	9	77.34	0025	4560.	4300.	015K	16	0000	0
GIL	104	1	0027	0000	8	78 915	23 34.7'N	44 59.9'W	9	77.34	0027	3840.	2870.	014K	16	0000	0
GIL	104	1	0029	0000	8	78 916	23 38.8'N	44 48.1'W	9	77.34	0029	3880.	3620.	014K	19	0000	0
KNR	79	2	0010	0000	8	80 531	23 37.4'N	44 44.3'W	9	77.34	0010	4225.	4077.	117K	19	0000	0
KNR	79	2	0017	0000	8	80 6 3	23 34.3'N	44 48.5'W	9	77.34	0017	3890.	3640.	011K	16	0000	0
KNR	79	2	0021	0000	8	80 6 5	23 33.4'N	44 55.5'W	9	77.34	0021	5068.	4616.	120K	16	0000	0
KNR	79	2	0025	0000	8	80 6 7	23 36.4'N	44 46.7'W	9	77.34	0025	3671.	3910.	018K	16	0000	0
KNR	79	2	0026	0000	8	80 6 8	23 36.7'N	44 47.3'W	9	77.34	0026	3660.	3670.	010K	16	0000	0
KNR	79	2	0027	0000	8	80 6 8	23 36.5'N	44 46.4'W	9	77.34	0027	3930.	3743.	035K	16	0000	0
KNR	79	2	0028	0000	8	80 6 8	23 37.0'N	44 49.0'W	9	77.34	0028	3840.	3580.	073K	16	0000	0
KNR	79	2	0034	0000	8	80 610	23 31.0'N	44 54.4'W	3	77.34	0034	4770.	4770.	040K	16	0000	0
AII	78	2	0006	0000	8	731017	23 4.0'N	45 10.0'W	9	77.35	0006	3255.	2435.	013K	15	0000	0
AII	92	2	0028	0000	8	7510 5	23 2.8'N	45 4.5'W	12	77.35	0004	2278.	1701.	065K	16	0000	0
AII	92	2	0029	0000	8	7510 5	23 2.6'N	45 1.0'W	12	77.35	0005	2889.	2475.	100K	16	0000	0
AII	96	3	0014	0000	8	771118	23 36.2'N	45 1.6'W	0	77.35	0014	3611.	2700.	134K	19	0000	0
AII	96	3	0015	0000	8	771118	23 32.7'N	45 5.4'W	0	77.35	0015	2044.	1800.	031K	19	0000	0
AII	96	3	0016	0000	8	771124	23 47.5'N	45 49.9'W	0	77.35	0016	4450.	3762.	079K	19	0000	0
AII	96	3	0017	0000	8	771124	23 43.8'N	45 58.7'W	0	77.35	0017	3800.	3478.	009K	19	0000	0
GIL	104	1	0020	0000	8	78 912	23 37.7'N	45 2.8'W	9	77.35	0020	4380.	3820.	075K	16	0000	0
KNR	79	2	0015	0000	8	80 6 2	23 36.7'N	45 5.9'W	9	77.35	0015	3682.	2430.	4.2K	19	0000	0
AII	78	2	0010	0000	8	731020	23 0.0'N	46 13.0'W	9	77.36	0010	3310.	2780.	009K	15	0000	0
AII	78	2	0011	0000	8	731021	23 3.0'N	47 4.0'W	9	77.36	0011	4335.	3710.	001K	15	0000	0
AII	96	3	0001	0000	8	7711 7	23 48.3'N	46 34.5'W	0	77.36	0001	3918.	2969.	106K	19	0000	0
AII	96	3	0002	0000	8	7711 8	23 50.0'N	46 34.3'W	0	77.36	0002	4569.	3462.	003K	19	0000	0
AII	96	3	0003	0000	8	7711 8	23 46.5'N	46 34.5'W	0	77.36	0003	3022.	2782.	011K	19	0000	0
AII	96	3	0004	0000	8	7711 8	23 51.1'N	46 23.3'W	0	77.36	0004	5095.	3326.	063K	19	0000	0
AII	96	3	0006	0000	8	7711 9	23 52.9'N	46 15.8'W	0	77.36	0006	5505.	4798.	104K	19	0000	0
AII	96	3	0007	0000	8	7711 9	23 55.1'N	46 14.5'W	0	77.36	0007	4259.	3573.	046K	19	0000	0
GIL	104	1	0007	0000	8	78 9 7	23 51.2'N	46 20.0'W	9	77.36	0007	5060.	4780.	012K	19	0000	0
GIL	104	1	0035	0000	8	78 918	23 51.2'N	46 13.4'W	9	77.36	0035	4590.	4010.	021K	19	0000	0
GIL	104	1	0037	0000	8	78 919	23 50.5'N	46 8.3'W	9	77.36	0037	4550.	4320.	4.2K	19	0000	0
GIL	104	1	0040	0000	8	78 920	23 48.3'N	46 16.9'W	9	77.36	0040	5220.	4820.	4.3K	19	0000	0
GIL	104	1	0047	0000	8	78 922	23 56.7'N	46 18.0'W	9	77.36	0047	4580.	4470.	011K	16	0000	0
AII	78	2	0012	0000	8	731022	23 11.0'N	48 46.0'W	9	77.38	0012	4830.	3880.	015K	15	0000	0
AII	78	2	0013	0000	8	731023	23 15.0'N	49 11.0'W	9	77.39	0013	4995.	4140.	023K	15	0000	0
AII	78	2	0014	0000	8	731023	23 16.0'N	49 13.0'W	9	77.39	0014	4910.	3705.	025K	15	0000	0
AII	96	3	0008	0000	8	7711 9	24 0.7'N	46 11.2'W	0	77.46	0008	2860.	2212.	173K	19	0000	0
GIL	104	1	0001	0000	8	78 9 6	24 11.0'N	46 16.9'W	9	77.46	0001	4090.	3910.	010K	16	0000	0
GIL	104	1	0002	0000	8	78 9 6	24 9.4'N	46 16.1'W	9	77.46	0002	3970.	3800.	051K	16	0000	0
AII	59	8	0003	0000	8	7012 4	26 59.0'N	42 40.0'W	1	77.62	0003	3500.	3390.	018K	16	0000	0
AII	59	8	0004	0000	8	7012 4	27 10.0'N	43 28.0'W	1	77.73	0004	3235.	2910.	002K	16	0000	0

MARSDEN SQUARE # 77

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	59	8	0005	0000	8	7012 4	27 12.0'N	43 36.0'W	1	77.73	0005	3670.	2885.	150K	16	0000	0
AII	59	8	0006	0000	8	7012 5	27 15.0'N	43 49.0'W	1	77.73	0006	2980.	2630.	004K	16	0000	0
AII	59	8	0007	0000	8	7012 5	27 14.0'N	43 58.0'W	1	77.73	0007	2785.	2140.	012K	16	0000	0
AII	59	8	0010	0000	8	7012 7	27 18.0'N	44 22.0'W	1	77.74	0010	2860.	2255.	001K	16	0000	0
AII	59	8	0011	0000	8	7012 7	27 29.0'N	44 44.0'W	1	77.74	0011	2745.	2535.	500G	16	0000	0
CHN	21	1	0020	0000	8	6112 9	28 54.5'N	43 18.3'W	5	77.83	0020	3692.	3701.	095K	14	0000	0
CHN	21	1	0006	0000	8	61 9 3	29 4.0'N	43 2.0'W	1	77.93	0006	2264.	2264.	3.4K	16	0000	0
CHN	21	1	0007	0000	7	61 9 3	29 4.0'N	43 3.0'W	1	77.93	0007	2264.	2264.	6.9K	16	0000	0
CHN	21	1	0004	0000	8	61 9 2	29 4.3'N	44 15.6'W	1	77.94	0004	3806.	3692.	907G	14	0000	0
CHN	21	1	0003	0000	8	61 829	29 0.0'N	47 26.8'W	1	77.97	0003	3795.	4706.	454G	15	0000	0

MARSDEN SQUARE # 78

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	78	2	0015	0000	8	731024	23 24.0'N	50 45.0'W	9	78.30	0015	5420.	4680.	160K	15	0000	0
AII	78	2	0016	0000	8	731025	23 25.0'N	52 2.0'W	9	78.32	0016	5615.	4810.	100K	15	0000	0
CHN	39	2	0008	0000	8	63 912	23 58.0'N	55 0.0'W	5	78.35	0005	5820.	4935.	227G	11	0000	0
CHN	39	2	0006	0000	10	63 911	24 28.0'N	55 6.0'W	5	78.45	0004	6097.	5884.	1.1K	11	0000	0
CHN	39	2	0003	0000	8	63 9 9	25 14.0'N	54 51.0'W	5	78.54	0002	6228.	6177.	113G	11	0000	0
CHN	39	2	0005	0000	8	63 910	25 12.0'N	55 28.0'W	5	78.55	0003	5564.	4722.	227G	11	0000	0
CHN	39	2	0012	0000	8	63 916	29 14.0'N	59 47.0'W	5	78.99	0006	5578.	5537.	113G	11	0000	0
CHN	39	2	0013	0000	8	63 917	29 22.0'N	59 48.0'W	5	78.99	0007	5723.	5472.	454G	11	0000	0
CHN	39	2	0014	0000	8	63 918	29 47.0'N	59 39.0'W	5	78.99	0008	5647.	5076.	227G	11	0000	0

MARSDEN SQUARE # 79

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	11	2	0021	0000	8	64 7 5	20 6.0'N	65 8.0'W	5	79.05	0001	7861.	6671.	107K	5	0000	0
AII	11	2	0022	0000	8	64 7 6	20 6.8'N	65 3.8'W	5	79.05	0002	7265.	6572.	200K	5	0000	0
AII	11	2	0024	0000	8	64 7 7	20 6.0'N	65 7.0'W	5	79.05	0003	7463.	6078.	046K	5	0000	0
AII	11	2	0025	0000	8	64 7 8	20 0.8'N	65 9.0'W	5	79.05	0004	8140.	7463.	073K	5	0000	0
AII	11	2	0030	0000	8	64 710	20 8.0'N	65 3.5'W	5	79.05	0008	7352.	7287.	118K	5	0000	0
CHN	34	1	0003	0000	8	6212 4	20 16.0'N	65 41.0'W	5	79.05	0003	7002.	6127.	126K	17	0000	0
CHN	34	1	0004	0000	8	6212 4	20 12.5'N	65 48.0'W	5	79.05	0004	6687.	6518.	3.6K	17	0000	0
CHN	57	1	0031	0000	7	66 4 7	20 3.9'N	65 51.0'W	4	79.05	0002	7457.	7145.	340G	17	0000	0
CHN	11	4	0039	0000	7	60 3 7	20 0.0'N	66 36.0'W	4	79.06	0039	5302.	5302.	700G	17	0000	0
CHN	19	1	0010	0000	8	61 630	20 0.0'N	66 32.5'W	5	79.06	0010	6563.	6436.	010K	17	0000	0
CHN	19	1	0011	0000	8	61 7 1	20 7.9'N	66 28.3'W	5	79.06	0011	3115.	3176.	454G	17	0000	0
CHN	19	1	0013	0000	8	61 7 2	20 10.0'N	66 19.0'W	5	79.06	0013	6264.	6178.	7.7K	17	0000	0
CHN	57	1	0019	0000	8	66 322	20 2.3'N	66 7.5'W	4	79.06	0001	7183.	6671.	002K	17	0000	0
CHN	57	1	0020	0000	7	66 322	20 1.5'N	66 10.0'W	5	79.06	0001	6807.	6671.	1.3K	17	0000	0

MARSDEN SQUARE # 83

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
GIL	107	1	0001	0000	8	791021	22 50.1'N	108 8.4'W	9	83.28	0001	3215.	3125.	041K	14	0000	0
GIL	107	1	0002	0000	8	791022	22 45.2'N	108 10.0'W	9	83.28	0002	3050.	3050.	034K	16	0000	0
GIL	107	1	0003	0000	8	791022	22 41.8'N	108 13.6'W	9	83.28	0003	3000.	3035.	010K	16	0000	0
GIL	107	1	0004	0000	8	791022	22 40.4'N	108 14.3'W	9	83.28	0004	2975.	3035.	2.3K	16	0000	0
GIL	107	1	0005	0000	8	791023	22 34.6'N	108 24.0'W	9	83.28	0005	2900.	2865.	4.5K	16	0000	0

MARSDEN SQUARE # 83

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
GIL	107	1	0006	0000	8	791023	22 35.5'N	108 19.7'W	9	83.28	0006	2975.	2875.	091K	16	0000	0
GIL	107	1	0007	0000	8	791024	22 25.9'N	108 24.6'W	9	83.28	0007	2630.	2630.	073K	16	0000	0
GIL	107	1	0008	0000	8	791024	22 29.4'N	108 25.2'W	9	83.28	0008	2650.	2720.	045K	16	0000	0
GIL	107	1	0009	0000	8	791024	22 54.1'N	108 24.3'W	9	83.28	0009	3195.	3195.	3.6K	16	0000	0
GIL	107	1	0010	0000	8	791024	22 50.7'N	108 7.1'W	9	83.28	0010	3200.	3100.	4.5K	16	0000	0
GIL	107	1	0011	0000	8	791025	22 31.0'N	108 22.9'W	9	83.28	0011	2900.	2835.	182K	16	0000	0
GIL	107	1	0012	0000	8	791024	22 33.5'N	108 24.2'W	9	83.28	0012	2880.	2780.	011K	16	0000	0
GIL	107	1	0013	0000	8	791025	22 58.5'N	108 9.5'W	9	83.28	0013	2780.	2850.	2.7K	16	0000	0
GIL	107	1	0014	0000	8	791026	22 27.0'N	108 23.4'W	9	83.28	0014	2630.	2630.	3.2K	16	0000	0
GIL	107	1	0015	0000	8	791026	22 31.1'N	108 19.5'W	9	83.28	0015	2770.	2750.	059K	16	0000	0
GIL	107	1	0016	0000	8	791026	22 51.9'N	108 10.4'W	9	83.28	0016	2720.	2895.	027K	16	0000	0
GIL	107	1	0017	0000	8	791027	22 37.2'N	108 14.6'W	9	83.28	0017	3000.	2950.	030K	16	0000	0
GIL	107	1	0018	0000	8	791027	22 39.3'N	108 14.5'W	9	83.28	0018	2995.	2978.	048K	16	0000	0

MARSDEN SQUARE #105

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	43	1	0003	0000	8	64 325	20 58.8'N	38 9.5'E	5	105.08	0001	2131.	1543.	456G	16	0000	0
CHN	61	7	0145	0000	8	6611 2	21 22.0'N	38 4.2'E	10	105.18	0002	2130.	2130.	680G	21	0000	0
CHN	43	1	0076	0000	8	64 6 9	28 53.0'N	32 58.0'E	5	105.82	0029	49.	49.	002K	21	0000	0

MARSDEN SQUARE #110

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	7	9	0021	0000	7	59 725	33 44.0'N	14 20.0'W	4	110.34	0021	199.	199.	085G	12	0000	0
CHN	7	9	0022	0000	7	59 725	33 44.0'N	14 20.0'W	4	110.34	0022	415.	274.	3.2K	12	0000	0
CHN	7	9	0023	0000	7	59 725	33 44.0'N	14 20.0'W	4	110.34	0023	772.	500.	567G	12	0000	0
CHN	7	9	0019	0000	7	59 725	35 5.0'N	12 13.0'W	4	110.52	0019	169.	199.	1.4K	12	0000	0
CHN	7	9	0020	0000	7	59 725	35 5.0'N	12 13.0'W	4	110.52	0020	208.	98.	4.5K	12	0000	0
CHN	7	1	0002	0000	7	59 510	36 13.0'N	12 15.0'W	4	110.62	0002	114.	114.	012K	12	0000	0
CHN	7	1	0003	0000	7	59 510	36 13.0'N	12 15.0'W	4	110.62	0003	85.	85.	227G	12	0000	0
CHN	7	1	0004	0000	7	59 510	36 12.0'N	12 15.0'W	4	110.62	0004	95.	123.	6.4K	12	0000	0

MARSDEN SQUARE #111

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	7	9	0001	0000	8	59 730	30 2.0'N	28 34.0'W	4	111.08	0001	640.	612.	020K	12	0000	0
CHN	7	9	0002	0000	8	59 730	30 2.0'N	28 33.0'W	4	111.08	0002	4988.	4988.	3.2K	12	0000	0
CHN	7	9	0024	0000	7	59 731	30 0.0'N	28 25.0'W	4	111.08	0024	295.	295.	340G	12	0000	0
CHN	7	9	0025	0000	7	59 731	30 0.0'N	28 23.0'W	4	111.08	0025	295.	295.	3.2K	12	0000	0
CHN	7	9	0026	0000	7	59 731	30 0.0'N	28 33.0'W	4	111.08	0026	1598.	1261.	113G	12	0000	0
CHN	7	9	0027	0000	7	59 8 1	30 0.0'N	28 30.0'W	4	111.08	0027	288.	288.	4.6K	12	0000	0
AII	13	1	0076	0000	8	64 924	37 51.0'N	25 52.0'W	1	111.75	0002	73.	73.	004K	1	0000	0

MARSDEN SQUARE #112

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	73	1	0010	0000	8	721124	36 44.7'N	33 15.2'W	11	112.63	0002	2328.	2391.	016K	14	0000	0
AII	73	1	0012	0000	8	721125	36 44.4'N	33 16.7'W	11	112.63	0003	2476.	2426.	120G	16	0000	0
AII	73	1	0014	0000	8	721125	36 44.5'N	33 17.2'W	11	112.63	0004	2519.	2475.	066K	16	0000	0

MARSDEN SQUARE #112

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	73	1	0016	0000	8	721126	36 42.0'N	33 17.6'W	11	112.63	0005	2627.	2627.	6.6K	16	0000	0
AII	73	1	0018	0000	8	721126	36 44.5'N	33 17.1'W	11	112.63	0006	2589.	2589.	9.1K	16	0000	0
AII	73	1	0024	0000	8	721127	36 45.5'N	33 21.2'W	11	112.63	0008	1745.	1477.	073G	16	0000	0
AII	73	1	0038	0000	8	7212 6	36 29.7'N	33 23.9'W	11	112.63	0009	2626.	2626.	8.7K	16	0000	0
AII	73	1	0047	0000	8	7212 9	36 30.6'N	33 25.3'W	11	112.63	0012	2781.	2250.	017K	16	0000	0
AII	73	1	0050	0000	8	7212 9	36 29.3'N	33 39.0'W	11	112.63	0013	2589.	2589.	011K	16	0000	0
AII	77	2	0019	0000	8	73 811	36 32.5'N	33 34.0'W	1	112.63	0002	2713.	2713.	6.8K	16	0000	0
AII	77	2	0023	0000	8	73 813	36 34.5'N	33 37.0'W	1	112.63	0003	2913.	2900.	4.9K	16	0000	0
AII	77	2	0026	0000	8	73 814	36 25.0'N	33 46.0'W	10	112.63	0004	2671.	2671.	016K	16	0000	0
AII	77	2	0028	0000	8	73 814	36 34.0'N	33 37.0'W	11	112.63	0005	2738.	2738.		16	0000	0
AII	77	2	0037	0000	8	73 820	36 43.0'N	33 20.0'W	11	112.63	0006	2437.	2437.	228K	16	0000	0
AII	77	2	0038	0000	8	73 820	36 43.0'N	33 20.5'W	11	112.63	0007	2443.	2443.	120K	16	0000	0
AII	77	2	0045	0000	8	73 820	36 35.0'N	33 42.5'W	10	112.63	0008	2500.	2500.	570G	16	0000	0
AII	77	2	0048	0000	8	73 821	36 37.0'N	33 31.0'W	11	112.63	0009	2437.	2437.	038K	19	0000	0
AII	77	2	0052	0000	8	73 822	36 35.0'N	33 31.5'W	11	112.63	0010	2437.	2437.	120K	16	0000	0
AII	77	2	0058	0000	8	73 823	36 27.5'N	33 35.0'W	11	112.63	0011	2231.	2231.	029K	16	0000	0
AII	77	2	0062	0000	8	73 824	36 27.0'N	33 55.0'W	10	112.63	0012	1408.	1408.	013K	14	0000	0
AII	77	2	0063	0000	8	73 824	36 26.0'N	33 53.5'W	10	112.63	0013	1876.	1876.	024K	14	0000	0
AII	77	2	0067	0000	8	73 826	36 26.5'N	33 40.0'W	11	112.63	0014	2616.	2616.	035K	16	0000	0
AII	77	2	0070	0000	8	73 826	36 26.5'N	33 41.0'W	9	112.63	0015	2437.	2437.	015K	16	0000	0
AII	77	2	0071	0000	8	73 827	36 24.4'N	33 40.8'W	9	112.63		2500.	2700.	018K	16	0000	0
AII	77	2	0076	0000	8	73 828	36 26.5'N	33 38.5'W	11	112.63	0016	2518.	2518.	198K	16	0000	0
GIL	103	1	0001	0000	8	78 729	36 47.6'N	33 18.3'W	9	112.63	0001	1968.	1968.	6K	16	0000	0
GIL	103	1	0004	0000	8	78 8 1	36 26.6'N	33 37.6'W	11	112.63	0004	2616.	2440.	25K	16	0000	0
GIL	103	1	0005	0000	8	78 8 2	36 25.7'N	33 38.9'W	11	112.63	0005	2627.	2551.	35K	16	0000	0
GIL	103	1	0006	0000	8	78 8 2	36 26.5'N	33 41.0'W	11	112.63	0006	2400.	2400.	1K	16	0000	0
GIL	103	1	0008	0000	8	78 8 3	36 28.9'N	33 40.0'W	11	112.63	0008	2485.	2477.	4K	16	0000	0
GIL	103	1	0009	0000	8	78 8 4	36 27.8'N	33 37.8'W	11	112.63	0009	2590.	2230.	55K	16	0000	0
GIL	103	1	0016	0000	8	78 813	36 46.8'N	33 16.7'W	11	112.63	0016	2617.	2617.	2K	16	0000	0
GIL	103	1	0020	0000	8	78 815	36 46.4'N	33 17.3'W	11	112.63	0020	2694.	2694.	55K	16	0000	0
GIL	103	1	0021	0000	8	78 816	36 46.5'N	33 16.6'W	11	112.63	0021	2627.	2589.	10K	16	0000	0
GIL	103	1	0023	0000	8	78 816	36 45.5'N	33 17.5'W	11	112.63	0023	2532.	2203.	25K	16	0000	0
GIL	103	1	0024	0000	8	78 817	36 47.6'N	33 17.4'W	11	112.63	0024	2484.	2250.	12K	16	0000	0
GIL	103	1	0027	0000	8	78 817	36 27.1'N	33 40.9'W	11	112.63	0027	2231.	2276.	115K	16	0000	0
GIL	103	1	0029	0000	8	78 818	36 47.1'N	33 16.5'W	11	112.63	0029	2523.	2523.		16	0000	0
GIL	103	1	0030	0000	8	78 818	36 45.5'N	33 15.7'W	11	112.63	0030	2100.	2100.	15K	16	0000	0
GIL	103	1	0032	0000	8	78 820	36 43.8'N	33 17.5'W	11	112.63	0032	2484.	2390.	160K	16	0000	0
GIL	103	1	0033	0000	8	78 820	36 46.8'N	33 15.8'W	11	112.63	0033	2674.	2334.	200K	16	0000	0
GIL	103	1	0035	0000	8	78 820	36 47.8'N	33 16.9'W	11	112.63	0035	2532.	2390.	80K	16	0000	0
GIL	103	1	0037	0000	8	78 821	36 27.2'N	33 38.6'W	11	112.63	0037	2579.	2560.	20K	16	0000	0
GIL	103	1	0038	0000	8	78 821	36 25.4'N	33 39.2'W	11	112.63	0038	2580.	2532.	30K	16	0000	0
GIL	103	1	0041	0000	8	78 823	36 26.6'N	33 95.2'W	11	112.63	0041	2532.	2457.	7K	16	0000	0
GIL	103	1	0043	0000	8	78 824	36 26.5'N	33 41.1'W	11	112.63	0043	2484.	2580.	4K	16	0000	0
GIL	103	1	0046	0000	8	78 824	36 26.5'N	33 41.1'W	11	112.63	0046	2484.	2250.	35K	16	0000	0
GIL	103	1	0047	0000	8	78 825	36 45.8'N	33 18.8'W	11	112.63	0047	2391.	1905.	210K	16	0000	0
KNR	42	2	0025	0000	8	74 629	36 56.7'N	33 9.1'W	9	112.63	0003	2993.	2963.	1.6K	19	0000	0
KNR	42	2	0028	0000	8	74 630	36 54.9'N	33 9.8'W	9	112.63	0004	2889.	2608.	041K	19	0000	0
KNR	42	2	0033	0000	8	74 7 2	36 57.0'N	33 7.9'W	9	112.63	0005	2908.	2533.	007K	19	0000	0
KNR	42	2	0035	0000	8	74 7 3	36 56.4'N	33 8.1'W	9	112.63	0006	3041.	2685.	3.5K	19	0000	0
KNR	42	3	0051	0000	8	74 715	36 36.1'N	33 24.8'W	9	112.63	0008	2599.	2174.	065K	19	0000	0

MARSDEN SQUARE #112

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
KNR	42	3	0068	0000	8	74 717	36 50.8'N	33 23.3'W	9	112.63	0009	1564.	1465.	015K	19	0000	0
KNR	42	3	0077	0000	8	74 718	36 36.9'N	33 27.6'W	9	112.63	0011	2137.	1763.	169K	19	0000	0
KNR	42	3	0086	0000	8	74 719	36 38.4'N	33 19.5'W	9	112.63	0012	2901.	2740.	178K	16	0000	0
KNR	42	3	0102	0000	8	74 722	36 50.8'N	33 19.7'W	9	112.63	0016	1603.	0.	005K	14	0000	0
KNR	42	3	0108	0000	8	74 723	36 50.6'N	33 21.4'W	9	112.63	0017	1763.	1762.	014K	14	0000	0
KNR	42	3	0110	0000	8	74 724	36 53.2'N	33 32.1'W	9	112.63	0018	1727.	1347.	2.4K	14	0000	0
KNR	42	3	0112	0000	8	74 724	36 52.8'N	33 31.7'W	9	112.63	0019	1623.	1732.	0.5K	14	0000	0
KNR	42	3	0117	0000	8	74 725	36 47.9'N	33 13.7'W	9	112.63	0020	1679.	1648.	1.8K	14	0000	0
KNR	42	4	0121	0000	8	74 8 3	36 37.5'N	33 28.1'W	9	112.63	0021	1838.	1801.	101K	19	0000	0
KNR	42	4	0122	0000	8	74 8 3	36 37.3'N	33 28.0'W	9	112.63	0022	1932.	1857.	064K	19	0000	0
KNR	42	4	0129	0000	8	74 8 3	36 36.4'N	33 28.5'W	9	112.63	0024	2118.	2025.	075K	19	0000	0
KNR	42	4	0130	0000	8	74 8 4	36 34.9'N	33 27.2'W	9	112.63	0025	2104.	2102.	073K	19	0000	0
KNR	42	4	0131	0000	8	74 8 4	36 36.4'N	33 29.3'W	9	112.63	0026	2062.	2034.	019K	19	0000	0
KNR	42	4	0137	0000	8	74 8 5	36 50.9'N	33 32.5'W	9	112.63	0027	1353.	1293.	069K	14	0000	0
KNR	42	4	0145	0000	8	74 8 6	36 33.4'N	33 28.2'W	9	112.63	0029	2141.	2161.	075K	19	0000	0
KNR	42	4	0146	0000	8	74 8 6	36 31.9'N	33 29.4'W	9	112.63	0030	2108.	1875.	172K	19	0000	0
KNR	42	5	0156	0000	8	74 816	36 50.8'N	33 32.2'W	9	112.63	0031	1587.	1279.	012K	14	0000	0
AII	13	1	0077	0000	8	64 926	39 35.0'N	31 12.0'W	1	112.91	0003	191.	191.	004K	1	0000	0

MARSDEN SQUARE #113

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	7	9	0028	0000	7	59 8 5	31 18.0'N	44 31.0'W	4	113.14	0028	3614.	3642.	3.7K	15	0000	0

MARSDEN SQUARE #114

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	85	1	0024	0000	8	74 910	34 28.1'N	56 47.8'W	9	114.46	0024	3050.	3000.	020K	12	0000	0
KNR	42	5	0161	0000	8	74 824	34 48.6'N	57 13.4'W	9	114.47	0033	3310.	3084.	007K	12	0000	0
KNR	42	5	0162	0000	8	74 824	34 53.3'N	57 11.2'W	9	114.47	0034	2706.	2436.	005K	12	0000	0
AII	85	1	0023	0000	8	74 9 9	35 17.5'N	57 38.5'W	9	114.57	0023	3600.	2450.	008K	12	0000	0
KNR	61	1	0022	0000	8	761111	35 18.5'N	57 30.5'W	6	114.57	0022	3200.	2250.	050K	12	0000	0
KNR	61	1	0023	0000	8	761111	35 18.4'N	57 31.5'W	6	114.57	0023	2625.	2650.	017K	12	0000	0
KNR	61	1	0024	0000	8	761112	35 18.2'N	57 32.3'W	9	114.57	0024	2725.	2125.	100K	12	0000	0
KNR	61	1	0027	0000	8	761113	35 6.2'N	57 25.2'W	6	114.57	0027	3500.	2325.	030K	12	0000	0
KNR	61	1	0028	0000	8	761113	35 5.7'N	57 25.2'W	9	114.57	0028	3200.	2550.	018K	12	0000	0
KNR	61	1	0029	0000	8	761113	35 5.2'N	57 24.6'W	6	114.57	0029	3025.	2425.	025K	12	0000	0
KNR	42	5	0166	0000	8	74 825	35 36.3'N	58 41.4'W	6	114.58	0036	4227.	3805.	5.2K	12	0000	0
AII	85	1	0017	0000	8	74 9 6	36 51.6'N	58 47.8'W	9	114.68	0017	2900.	2200.	114K	12	0000	0
AII	85	1	0021	0000	8	74 9 8	36 23.6'N	58 15.5'W	9	114.68	0021	3300.	2300.	011K	12	0000	0
AII	85	1	0022	0000	8	74 9 8	36 16.1'N	58 19.5'W	9	114.68	0022	3500.	2900.	010K	12	0000	0
KNR	61	1	0031	0000	8	761114	36 18.8'N	58 18.0'W	9	114.68	0031	3125.	1900.	110K	12	0000	0
KNR	61	1	0032	0000	8	761114	36 18.7'N	58 18.0'W	6	114.68	0032	3150.	2625.	008K	12	0000	0
KNR	61	1	0033	0000	8	761114	36 19.6'N	58 18.5'W	6	114.68	0033	2975.	2475.	045K	12	0000	0
AII	85	1	0018	0000	8	74 9 7	36 30.0'N	59 24.7'W	9	114.69	0018	3800.	2550.	100K	12	0000	0
AII	85	1	0019	0000	8	74 9 7	36 27.9'N	59 27.9'W	9	114.69	0019	2800.	2500.	095K	12	0000	0
AII	85	1	0020	0000	8	74 9 7	36 21.2'N	59 11.5'W	9	114.69	0020	3200.	2300.	050K	12	0000	0
KNR	42	5	0168	0000	8	74 826	36 31.6'N	59 25.7'W	9	114.69	0037	4025.	3796.	1.2K	12	0000	0
ATL	280	1	0012	0000	7	62 619	37 29.0'N	59 47.0'W	5	114.79	0012	1298.	1279.	4.5K	12	0000	0
ATL	280	1	0013	0000	7	62 619	37 33.0'N	59 48.0'W	5	114.79	0013	1295.	1295.	680G	12	0000	0

MARSDEN SQUARE #114

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
KNR	42	5	0171	0000	8	74 827	37 30.6'N	59 52.2'W	6	114.79	0039	1523.	1260.	143K	12	0000	0
KNR	61	1	0016	0000	8	7611 9	37 27.2'N	59 45.2'W	6	114.79	0016	2950.	2350.	005K	12	0000	0
KNR	61	1	0017	0000	8	7611 9	37 26.0'N	59 45.4'W	6	114.79	0017	3000.	3050.	080K	12	0000	0
KNR	61	1	0019	0000	8	761110	37 27.2'N	59 47.1'W	9	114.79	0019	2800.	2225.	031K	12	0000	0

MARSDEN SQUARE #115

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	9	6	0030	0000	7	591018	31 53.9'N	65 12.3'W	5	115.15	0002	1972.	1372.	028G	5	0000	0
CHN	9	6	0031	0000	7	591018	31 54.7'N	65 12.9'W	5	115.15	0003	1128.	1035.	003K	5	0000	0
CHN	9	7	0032	0000	7	591021	31 54.3'N	65 12.0'W	5	115.15	0005	1207.	1207.	340G	5	0000	0
CHN	9	7	0033	0000	7	591021	31 54.2'N	65 13.1'W	5	115.15	0006	1636.	1542.	227G	5	0000	0
CHN	9	7	0034	0000	7	591021	31 54.2'N	65 12.8'W	5	115.15	0007	1542.	1692.	002K	5	0000	0
CHN	9	7	0035	0000	7	591021	31 55.0'N	65 11.8'W	5	115.15	0008	885.	940.	002G	5	0000	0
CHN	9	7	0036	0000	7	591021	31 54.9'N	65 12.7'W	5	115.15	0009	1128.	997.	113G	5	0000	0
ATL	260	1	0007	0000	7	601018	33 34.0'N	62 26.0'W	5	115.32	0007	1542.	1497.	113G	12	0000	0
ATL	260	1	0008	0000	7	601018	33 36.0'N	62 25.5'W	5	115.32	0008	1422.	1422.	8.9K	12	0000	0
ATL	260	1	0009	0000	7	601020	33 36.5'N	62 24.5'W	5	115.32	0009	2553.	2630.	1.5K	12	0000	0
CHN	58	1	0100	0000	8	66 5 1	33 56.8'N	65 47.0'W	1	115.35	0009	4743.	4892.	035K	13	0000	0
AII	85	1	0016	0000	8	74 9 6	36 49.3'N	62 12.5'W	9	115.62	0016	3900.	3300.	041K	12	0000	0
CHN	21	1	0002	0000	8	61 818	36 40.0'N	67 56.5'W	5	115.67	0002	3292.	3283.	7.6K	12	0000	0
CHN	36	1	0018	0000	8	63 7 8	36 42.0'N	67 59.0'W	5	115.67	0006	4327.	4111.	051K	12	0000	0
ATL	280	1	0004	0000	7	62 616	38 57.0'N	60 58.0'W	5	115.80	0004	1150.	1114.	227G	12	0000	0
ATL	280	1	0005	0000	7	62 616	38 55.0'N	60 58.0'W	5	115.80	0005	1041.	1034.	010K	12	0000	0
ATL	280	1	0006	0000	7	62 616	38 58.0'N	60 57.0'W	5	115.80	0006	935.	944.	009K	12	0000	0
ATL	280	1	0009	0000	7	62 617	38 52.0'N	60 27.0'W	5	115.80	0009	1879.	1879.	227G	12	0000	0
ATL	280	1	0010	0000	7	62 618	38 13.0'N	60 26.0'W	5	115.80	0010	1785.	1785.	012K	12	0000	0
KNR	42	5	0174	0000	8	74 828	38 11.3'N	60 56.6'W	6	115.80	0040	3777.	3653.	250G	12	0000	0
KNR	61	1	0037	0000	8	761116	38 53.8'N	60 57.8'W	6	115.80	0037	2100.	1850.	034K	12	0000	0
KNR	61	1	0038	0000	8	761117	38 54.6'N	60 59.2'W	9	115.80	0038	1575.	1100.	040K	12	0000	0
KNR	61	1	0039	0000	8	761117	38 55.3'N	60 58.6'W	6	115.80	0039	1450.	1125.	025K	12	0000	0
KNR	61	1	0042	0000	8	761118	38 34.6'N	60 8.0'W	6	115.80	0042	3075.	2800.	020K	12	0000	0
KNR	61	1	0043	0000	8	761118	38 34.2'N	60 10.8'W	6	115.80	0043	2700.	2275.	3.4K	12	0000	0
ATL	280	1	0003	0000	7	62 616	38 54.0'N	61 1.0'W	5	115.81	0003	1298.	1241.	2.3K	12	0000	0
ATL	280	1	0014	0000	7	62 620	38 3.0'N	62 9.0'W	5	115.82	0014	1954.	1954.	011K	12	0000	0
ATL	280	1	0015	0000	7	62 620	38 4.0'N	62 8.0'W	5	115.82	0015	1474.	1474.	2.3K	12	0000	0
KNR	61	1	0014	0000	8	7611 8	38 26.0'N	62 51.0'W	6	115.82	0014	3125.	2550.	072K	12	0000	0
KNR	61	1	0015	0000	8	7611 8	38 26.3'N	62 50.5'W	9	115.82	0015	3300.	2400.	023K	12	0000	0
KNR	61	1	0044	0000	8	761118	38 18.4'N	62 56.0'W	9	115.82	0044	3925.	3150.	050K	12	0000	0
KNR	61	1	0045	0000	8	761119	38 18.0'N	62 56.4'W	6	115.82	0045	3700.	2575.	055K	12	0000	0
AII	85	1	0012	0000	8	74 9 2	38 24.6'N	63 14.7'W	9	115.83	0012	3300.	3100.	095K	12	0000	0
AII	85	1	0013	0000	8	74 9 3	38 25.3'N	63 13.9'W	9	115.83	0013	2500.	2200.	175K	12	0000	0
AII	85	1	0014	0000	8	74 9 3	38 6.8'N	62 11.6'W	9	115.83	0014	2900.	2100.	086K	12	0000	0
ATL	280	1	0016	0000	7	62 621	38 30.0'N	63 13.0'W	5	115.83	0016	1692.	1708.	011K	12	0000	0
ATL	296	0	0001	0000	8	63 8 8	38 16.0'N	63 5.0'W	5	115.83	0001	3691.	3254.	1.5K	12	0000	0
ATL	296	0	0002	0000	7	63 8 8	38 22.0'N	63 7.0'W	5	115.83	0002	3539.	3444.	010G	12	0000	0
KNR	61	1	0009	0000	8	7611 7	38 28.3'N	63 10.5'W	9	115.83	0009	2000.	1850.	059K	12	0000	0
KNR	61	1	0010	0000	8	7611 7	38 26.7'N	63 9.7'W	6	115.83	0010	2150.	2025.	0.5K	12	0000	0
KNR	61	1	0013	0000	8	7611 8	38 26.3'N	63 9.6'W	6	115.83	0013	2375.	2350.	005K	12	0000	0
AII	85	1	0009	0000	8	74 9 1	38 41.4'N	64 9.2'W	9	115.84	0009	4300.	3300.	170K	12	0000	0

MARSDEN SQUARE #115

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	85	1	0010	0000	8	74 9 1	38 44.0'N	64 8.1'W	9	115.84	0010	2600.	1850.	074K	12	0000	0
AII	85	1	0011	0000	8	74 9 1	28 50.0'N	64 3.8'W	9	115.84	0011	2300.	1800.	093K	12	0000	0
KNR	61	1	0034	0000	8	761116	39 2.7'N	60 55.6'W	9	115.90	0034	2650.	2475.	002K	12	0000	0
AII	85	1	0008	0000	8	74 830	39 38.6'N	65 53.1'W	9	115.95	0008	3300.	2600.	148K	12	0000	0
ATL	281	1	0017	0000	8	62 628	39 25.0'N	65 24.0'W	5	115.95	0017	1463.	0.	017K	12	0000	0
ATL	296	0	0003	0000	8	63 8 9	39 31.0'N	65 21.0'W	5	115.95	0003	3382.	3307.	001K	12	0000	0
ATL	296	0	0004	0000	8	63 8 9	39 31.0'N	65 21.0'W	5	115.95	0004	4143.	3961.	1.6K	12	0000	0
ATL	296	0	0006	0000	8	63 810	39 37.0'N	65 57.0'W	5	115.95	0006	3004.	1961.	007K	12	0000	0
ATL	296	0	0007	0000	8	63 810	39 37.0'N	65 59.0'W	5	115.95	0007	3476.	2437.	011K	12	0000	0
ATL	296	0	0008	0000	8	63 811	39 29.0'N	65 26.0'W	5	115.95	0008	2617.	2947.	008K	12	0000	0
KNR	42	5	0177	0000	8	74 830	39 29.6'N	65 24.1'W	6	115.95	0041	2798.	1887.	100G	12	0000	0
KNR	42	5	0178	0000	8	74 830	39 27.0'N	65 27.3'W	6	115.95	0042	2240.	2531.	012K	12	0000	0
AII	85	1	0006	0000	8	74 830	39 36.9'N	66 3.7'W	9	115.96	0006	3750.	2250.	035K	12	0000	0
AII	85	1	0007	0000	8	74 830	39 40.0'N	66 3.0'W	9	115.96	0007	2800.	2225.	200K	12	0000	0
KNR	42	5	0180	0000	8	74 831	39 50.2'N	66 12.6'W	6	115.96	0043	2354.	1885.	021K	12	0000	0
KNR	42	5	0181	0000	8	74 831	39 51.0'N	66 52.8'W	6	115.96	0044	2825.	1885.	002K	12	0000	0
KNR	61	1	0005	0000	8	7611 5	39 46.1'N	66 17.4'W	9	115.96	0005	2900.	3900.	071K	12	0000	0
KNR	61	1	0008	0000	8	7611 5	39 48.0'N	66 18.8'W	6	115.96	0008	2800.	2700.	2.6K	12	0000	0
KNR	61	1	0046	0000	8	761120	39 46.2'N	66 16.5'W	6	115.96	0046	3275.	2750.	7.4K	12	0000	0
KNR	61	1	0047	0000	8	761122	39 47.2'N	66 16.8'W	9	115.96	0047	2725.	3000.	070K	12	0000	0
AII	85	1	0001	0000	8	74 828	39 47.3'N	67 28.0'W	9	115.97	0001	3100.	2400.	095K	12	0000	0
AII	85	1	0002	0000	9	74 828	39 51.6'N	67 22.4'W	9	115.97	0002	2000.	1700.	033K	12	0000	0
ATL	281	1	0019	0000	8	62 629	39 23.0'N	67 11.0'W	5	115.97	0019	0.	0.	907G	12	0000	0
ATL	281	1	0020	0000	8	62 630	39 52.5'N	67 28.0'W	5	115.97	0020	1401.	0.	6.6K	12	0000	0
KNR	42	5	0182	0000	8	74 9 1	39 23.6'N	67 14.0'W	6	115.97	0045	3040.	3095.	100G	12	0000	0

MARSDEN SQUARE #116

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	52	1	0001	0000	7	65 927	30 1.0'N	76 43.2'W	5	116.06	0001	1269.	1267.	1.4K	7	0000	0
CHN	46	1	0011	0000	7	65 4 6	30 12.2'N	77 50.0'W	5	116.07	0004	819.	818.	1.1K	7	0000	0
CHN	46	1	0012	0000	7	65 4 6	30 25.9'N	77 52.0'W	5	116.07	0005	815.	815.	1.4K	7	0000	0
ATL	266	1	0040	0000	8	61 713	30 53.0'N	78 47.0'W	5	116.08	0040	836.	836.	026K	7	0000	0
ATL	266	1	0041	0000	8	61 715	30 59.0'N	78 14.0'W	5	116.08	0041	903.	903.	9.1K	7	0000	0
ATL	266	1	0042	0000	7	61 715	30 59.0'N	78 13.0'W	5	116.08	0042	834.	834.	013K	7	0000	0
ATL	266	1	0043	0000	7	61 717	30 57.0'N	78 21.0'W	5	116.08	0043	954.	954.	9.1K	7	0000	0
ATL	266	1	0045	0000	8	61 718	30 58.0'N	78 30.0'W	5	116.08	0045	833.	833.	044K	7	0000	0
ATL	266	1	0046	0000	8	61 718	30 58.5'N	78 30.0'W	5	116.08	0046	847.	847.	4.8K	7	0000	0
ATL	266	1	0047	0000	8	61 719	30 55.0'N	78 39.0'W	5	116.08	0047	842.	842.	6.6K	7	0000	0
ATL	266	1	0049	0000	7	61 719	30 54.0'N	78 41.0'W	5	116.08	0049	845.	845.	4.3K	7	0000	0
CHN	46	1	0015	0000	7	65 4 7	30 43.8'N	78 5.0'W	5	116.08	0006	875.	875.	1.4K	7	0000	0
CHN	46	1	0018	0000	7	65 4 7	30 50.0'N	78 11.0'W	5	116.08	0007	843.	843.	7.7K	7	0000	0
GOS	73	1	0002	0000	7	65 713	30 13.0'N	78 37.6'W	5	116.08	0002	809.	0.	910G	7	0000	0
GOS	73	1	0004	0000	7	65 713	30 15.2'N	78 39.5'W	5	116.08	0004	809.	0.	100G	7	0000	0
GOS	73	1	0005	0000	7	65 713	30 14.8'N	78 39.6'W	5	116.08	0005	809.	0.	1.7K	7	0000	0
GOS	73	1	0006	0000	7	65 713	30 15.8'N	78 41.7'W	5	116.08	0006	790.	0.	1.6K	7	0000	0
GOS	73	1	0007	0000	7	65 719	30 41.5'N	78 52.6'W	5	116.08	0007	0.	0.	2.7K	7	0000	0
GOS	73	1	0008	0000	7	65 719	30 38.7'N	78 51.5'W	5	116.08	0008	847.	0.	002K	7	0000	0
ATL	266	1	0012	0000	7	61 630	31 49.0'N	76 49.0'W	5	116.16	0012	1320.	1320.	1.2K	7	0000	0
ATL	266	1	0002	0000	8	61 625	31 58.0'N	77 18.5'W	5	116.17	0002	843.	843.	020K	7	0000	0

MARSDEN SQUARE #116

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
ATL	266	1	0003	0000	7	61 626	31 56.5'N	77 26.0'W	5	116.17	0003	739.	739.	012K	7	0000	0
ATL	266	1	0004	0000	7	61 626	31 56.0'N	77 26.0'W	5	116.17	0004	815.	815.	012K	7	0000	0
ATL	266	1	0005	0000	7	61 627	31 53.0'N	77 27.2'W	5	116.17	0005	815.	815.	020K	7	0000	0
ATL	266	1	0006	0000	7	61 627	31 54.8'N	77 25.0'W	5	116.17	0006	739.	739.	014K	7	0000	0
ATL	266	1	0007	0000	7	61 628	31 53.0'N	77 22.5'W	5	116.17	0007	739.	834.	010K	7	0000	0
ATL	266	1	0008	0000	7	61 628	31 53.0'N	77 21.0'W	5	116.17	0008	834.	834.	7.9K	7	0000	0
ATL	266	1	0016	0000	7	61 7 1	31 51.0'N	77 28.0'W	5	116.17	0016	689.	689.	015K	7	0000	0
ATL	266	1	0017	0000	7	61 7 1	31 52.0'N	77 28.0'W	5	116.17	0017	676.	676.	017K	7	0000	0
ATL	266	1	0020	0000	8	61 7 3	31 49.0'N	77 38.0'W	5	116.17	0020	692.	692.	567G	7	0000	0
ATL	266	1	0021	0000	8	61 7 3	31 50.5'N	77 37.0'W	5	116.17	0021	696.	696.	016K	7	0000	0
ATL	266	1	0022	0000	8	61 7 3	31 49.5'N	77 37.0'W	5	116.17	0022	705.	705.	018K	7	0000	0
ATL	266	1	0025	0000	7	61 7 6	31 48.0'N	77 34.0'W	5	116.17	0025	668.	668.	1.4K	7	0000	0
ATL	266	1	0026	0000	7	61 7 6	31 49.5'N	77 34.5'W	5	116.17	0026	865.	865.	010K	7	0000	0
ATL	266	1	0050	0000	7	61 721	31 52.5'N	79 10.0'W	5	116.19	0050	489.	489.	3.9K	7	0000	0
CHN	52	1	0004	0000	7	65 929	31 45.2'N	79 8.7'W	5	116.19	0002	528.	528.	1.6K	7	0000	0
CHN	52	1	0005	0000	7	65 929	31 40.5'N	79 12.0'W	5	116.19	0003	509.	509.	1.8K	7	0000	0
CHN	52	1	0007	0000	7	65 929	31 35.1'N	79 13.9'W	5	116.19	0004	464.	458.	010G	7	0000	0
CHN	52	1	0008	0000	7	65 930	31 36.6'N	79 17.0'W	5	116.19	0005	453.	453.	2.3K	7	0000	0
CHN	52	1	0009	0000	7	65 930	31 38.5'N	79 21.7'W	5	116.19	0006	528.	519.	1.9K	7	0000	0
CHN	52	1	0012	0000	7	6510 3	32 11.3'N	75 51.0'W	5	116.25	0008	2560.	2566.	1.5K	7	0000	0
ATL	266	1	0018	0000	7	61 7 2	32 0.5'N	77 35.0'W	5	116.27	0018	677.	677.	454G	7	0000	0
ATL	266	1	0019	0000	7	61 7 2	32 1.0'N	77 34.0'W	5	116.27	0019	684.	684.	567G	7	0000	0
CHN	52	1	0011	0000	8	6510 1	32 5.3'N	78 50.0'W	5	116.28	0007	383.	398.	042K	7	0000	0
GOS	73	1	0001	0000	7	65 713	33 10.0'N	78 20.0'W	5	116.38	0001	28.	0.	1.5K	7	0000	0
ATL	266	1	0051	0000	7	61 723	34 1.2'N	75 50.5'W	5	116.45	0051	659.	659.	001K	7	0000	0
ATL	266	1	0052	0000	7	61 723	34 2.0'N	75 40.0'W	5	116.45	0052	1993.	1993.	1.3K	7	0000	0
AII	1	1	0002	0000	7	63 3 4	39 43.0'N	70 42.6'W	5	116.90	0002	2027.	2027.	7.4K	4	0000	0
AII	86	3	0417	0000	8	75 314	39 30.0'N	70 40.0'W	6	116.90	0417	2460.	2480.	014K	6	0000	0
AII	86	3	0424	0000	8	75 316	39 27.0'N	70 28.0'W	6	116.90	0424	2505.	2530.	011K	6	0000	0
AII	86	3	0432	0000	8	75 319	39 31.0'N	70 20.0'W	6	116.90	0432	2350.	2450.	015K	6	0000	0

MARSDEN SQUARE #141

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	15	3	0008	0000	8	65 213	30 21.5'N	32 19.0'E	1	141.02	0001	7.	0.	227G	99	0000	0
AII	15	3	0009	0000	8	65 213	30 19.5'N	32 19.7'E	1	141.02	0002	9.	0.	227G	99	0000	0
AII	15	3	0015	0000	8	65 214	30 20.9'N	32 25.7'E	1	141.02	0003	9.	0.	227G	99	0000	0
AII	15	3	0016	0000	8	65 214	30 23.0'N	32 24.0'E	1	141.02	0004	4.	0.	227G	99	0000	0
AII	15	3	0017	0000	8	65 214	30 23.8'N	32 21.5'E	1	141.02	0005	5.	0.	227G	99	0000	0
AII	15	3	0018	0000	8	65 214	30 23.4'N	32 18.8'E	1	141.02	0006	4.	0.	113G	99	0000	0
AII	15	3	0019	0000	8	65 214	30 21.5'N	32 19.0'E	1	141.02	0007	7.	0.	113G	99	0000	0
CHN	119	2	0044	0000	8	75 328	31 41.2'N	30 30.3'E	1	141.10	0001	29.	33.	570G	24	0000	0
CHN	119	2	0060	0000	8	75 329	31 36.9'N	30 7.0'E	3	141.10	0002	219.	63.	254G	25	0000	0
CHN	119	2	0092	0000	8	75 4 2	31 40.7'N	30 41.3'E	3	141.10	0003	17.	17.	425G	24	0000	0
CHN	119	2	0105	0000	8	75 4 3	31 38.2'N	30 57.9'E	3	141.10	0004	6.	9.	176G	24	0000	0
CHN	119	2	0181	0000	8	75 410	32 1.8'N	31 24.0'E	9	141.21	0008	97.	105.	025K	24	0000	0
CHN	119	2	0124	0000	8	75 4 5	33 46.1'N	32 42.1'E	9	141.32	0005	917.	917.	1.5K	12	0000	0
CHN	43	1	0078	0000	8	64 617	33 24.5'N	35 12.0'E	5	141.35	0030	49.	49.	005K	2	0000	0
CHN	43	1	0079	0000	8	64 617	33 23.0'N	35 7.0'E	5	141.35	0031	577.	577.	113G	4	0000	0

MARSDEN SQUARE #143

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	61	2	0021	0000	8	66 8 9	36 13.5'N	13 24.6'E	6	143.63	0001	1268.	1268.	113G	21	0000	0
CHN	7	3	0009	0000	7	59 526	35 11.0'N	15 29.5'E	4	143.65	0009	1136.	1136.	454G	21	0000	0
CHN	7	3	0011	0000	7	59 526	36 10.9'N	15 32.0'E	4	143.65	0011	2104.	2104.	454G	21	0000	0
CHN	7	3	0005	0000	7	59 524	37 32.0'N	11 10.0'E	4	143.71	0005	358.	358.	004K	21	0000	0
CHN	7	3	0006	0000	7	59 524	37 32.0'N	11 10.0'E	4	143.71	0006	453.	453.	005K	21	0000	0
CHN	7	3	0007	0000	7	59 525	37 32.0'N	11 10.0'E	4	143.71	0007	453.	453.	9.3K	21	0000	0
CHN	7	4	0013	0000	7	59 6 8	37 39.0'N	16 37.5'E	4	143.76	0013	2296.	2296.	680G	21	0000	0

MARSDEN SQUARE #146

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	13	7	0008	0000	8	60 925	48 46.0'N	10 2.0'W	5	146.80	0008	334.	334.	113G	4	0000	0
CHN	13	7	0009	0000	8	60 925	48 47.0'N	10 1.5'W	5	146.80	0009	814.	841.	029K	4	0000	0

MARSDEN SQUARE #147

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	82	6	0029	0000	8	68 811	41 55.0'N	29 13.0'W	8	147.19	0001	3112.	3065.	227G	16	0000	0
AII	32	3	0001	0000	8	67 7 8	42 59.5'N	27 42.2'W	9	147.27	0001	3041.	2778.	TR	15	0000	0
AII	32	3	0002	0000	8	67 7 8	42 57.5'N	27 40.7'W	9	147.27	0002	2853.	2532.	TR	15	0000	0
AII	13	1	0075	0000	8	64 919	42 29.0'N	28 56.0'W	1	147.28	0001	1159.	1159.	031K	15	0000	0
CHN	43	1	0112	0000	8	64 812	42 39.3'N	28 59.1'W	10	147.28	0040	1628.	1628.	095G	16	0000	0
CHN	82	7	0034	0000	8	68 823	42 28.5'N	28 41.1'W	8	147.28	0002	1642.	1282.	011K	14	0000	0
CHN	82	8	0048	0000	8	68 9 2	42 55.4'N	28 55.0'W	8	147.28	0006	1189.	1610.	050K	16	0000	0
AII	32	3	0011	0000	8	67 712	42 57.3'N	29 15.5'W	9	147.29	0011	2174.	1988.	156K	16	0000	0
AII	32	3	0012	0000	8	67 712	42 57.6'N	29 12.1'W	9	147.29	0012	1820.	1440.	15K	16	0000	0
AII	32	3	0013	0000	8	67 712	42 55.5'N	29 7.8'W	9	147.29	0013	1279.	1054.	6K	16	0000	0
AII	32	3	0014	0000	8	67 713	42 59.5'N	29 16.6'W	9	147.29	0014	2910.	2703.	TR	16	0000	0
CHN	43	1	0113	0000	8	64 812	42 42.4'N	29 1.5'W	10	147.29	0041	1829.	1684.	024K	16	0000	0
CHN	82	7	0035	0000	8	68 823	42 31.0'N	29 15.0'W	8	147.29	0003	2489.	2471.	5.9K	16	0000	0
CHN	105	2	0008	0000	8	72 727	43 21.0'N	21 19.1'W	9	147.31	0008	4299.	3953.	0012	17	0000	0
CHN	105	2	0009	0000	8	72 729	43 18.1'N	21 38.1'W	9	147.31	0009	4278.	3457.	0002	17	0000	0
CHN	105	2	0010	0000	8	72 728	43 17.2'N	21 46.9'W	9	147.31	0010	2967.	2626.	0004	17	0000	0
CHN	105	2	0001	0000	8	72 726	43 52.0'N	22 13.6'W	9	147.32	0001	4528.	4106.	0010	17	0000	0
CHN	105	2	0003	0000	8	72 726	43 58.2'N	22 11.7'W	9	147.32	0003	3118.	2625.	0021	17	0000	0
CHN	105	2	0005	0000	8	72 727	43 38.8'N	22 6.0'W	9	147.32	0005	4528.	3764.	0013	17	0000	0
CHN	105	2	0006	0000	8	72 727	43 39.0'N	22 13.0'W	9	147.32	0006	3080.	2630.	0044	17	0000	0
CHN	105	2	0007	0000	8	72 727	43 35.7'N	22 27.2'W	9	147.32	0007	1727.	1316.	0005	17	0000	0
CHN	105	2	0011	0000	8	72 729	43 36.7'N	22 28.2'W	9	147.32	0011	1614.	1129.	0008	17	0000	0
AII	32	3	0003	0000	8	67 7 9	43 1.8'N	28 13.5'W	9	147.38	0003	1465.	1315.	11K	15	0000	0
AII	32	3	0004	0000	8	67 7 9	43 3.2'N	28 15.2'W	9	147.38	0004	1353.	1129.	TR	15	0000	0
AII	32	3	0005	0000	8	67 710	43 6.4'N	28 31.0'W	9	147.38	0005	1483.	1371.	4K	15	0000	0
AII	32	3	0006	0000	8	67 710	43 7.4'N	28 25.6'W	9	147.38	0006	2344.	1689.	TR	15	0000	0
AII	32	3	0007	0000	8	67 711	43 11.4'N	28 58.7'W	9	147.38	0007	3193.	2532.	TR	16	0000	0
AII	32	3	0008	0000	8	67 711	43 12.6'N	28 56.0'W	9	147.38	0008	2532.	2250.	138K	16	0000	0
AII	32	3	0009	0000	8	67 711	43 12.4'N	28 54.7'W	9	147.38	0009	1847.	1557.	TR	16	0000	0
AII	32	3	0010	0000	8	67 711	43 13.5'N	29 9.6'W	9	147.39	0010	2268.	1913.	.7K	16	0000	0
AII	32	3	0015	0000	8	67 713	43 1.0'N	29 18.2'W	9	147.39	0015	2344.	2118.	85G	16	0000	0
AII	32	3	0016	0000	8	67 714	43 14.8'N	29 21.3'W	9	147.39	0016	2778.	2325.	TR	15	0000	0
AII	32	3	0017	0000	8	67 714	43 19.8'N	29 14.2'W	9	147.39	0017	1913.	1596.	TR	15	0000	0

MARSDEN SQUARE #147

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	43	1	0107	0000	8	64 8 9	44 34.0'N	28 9.2'W	4	147.48	0038	3264.	3264.	3.3K	16	0000	0
CHN	43	1	0104	0000	8	64 8 8	45 11.0'N	27 56.0'W	4	147.57	0037	2697.	2527.	048K	16	0000	0

MARSDEN SQUARE #151

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
ATL	260	1	0003	0000	7	601012	40 4.0'N	69 1.5'W	5	151.09	0003	760.	722.	3.8K	25	0000	0
ATL	260	1	0004	0000	7	601012	40 3.6'N	69 2.0'W	5	151.09	0004	555.	333.	010K	25	0000	0

MARSDEN SQUARE #180

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	43	1	0093	0000	8	64 718	42 46.6'N	7 37.5'E	5	180.27	0035	2674.	2674.	794G	6	0000	0
CHN	43	1	0094	0000	8	64 718	42 46.5'N	7 37.5'E	5	180.27	0036	2674.	2674.	075G	6	0000	0
CHN	43	1	0088	0000	8	64 711	43 22.0'N	8 37.2'E	5	180.38	0033	2478.	2478.	3.1K	4	0000	0
CHN	43	1	0086	0000	8	64 7 8	43 36.0'N	9 24.0'E	5	180.39	0032	946.	946.	012K	4	0000	0

MARSDEN SQUARE #182

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	13	2	0041	0000	7	60 725	57 35.2'N	13 32.0'W	5	182.73	0041	147.	147.	012K	13	0000	0
CHN	13	2	0042	0000	7	60 725	57 35.2'N	13 32.0'W	1	182.73	0042	162.	162.	011K	13	0000	0

MARSDEN SQUARE #183

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	13	2	0040	0000	7	60 721	50 44.0'N	29 52.0'W	5	183.09	0040	3897.	3556.	5.7K	16	0000	0
CHN	13	2	0007	0000	8	60 723	51 28.0'N	29 45.0'W	1	183.19	0007	1301.	1301.	040K	14	0000	0

MARSDEN SQUARE #301

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	20	2	0017	0000	8	66 311	0 3.0'S	17 35.0'W	1	301.07	0017	5145.	4490.		19	0000	0
AII	20	2	0018	0000	8	66 311	0 5.5'S	17 36.0'W	1	301.07	0018	3870.	3650.		19	0000	0
AII	20	2	0011	0000	8	66 3 8	0 12.0'S	18 27.0'W	1	301.08	0011	7100.	5840.		19	0000	0
AII	20	2	0012	0000	8	66 3 9	0 11.0'S	18 26.0'W	1	301.08	0012	5400.	4235.	650G	19	0000	0
AII	20	2	0020	0000	8	66 313	0 15.0'S	18 33.0'W	1	301.08	0020	7620.	5300.		19	0000	0
AII	60	6	0015	0000	8	71 624	0 4.0'S	18 18.0'W	9	301.08	0015	4512.	3500.	128K	19	0000	0
AII	60	6	0017	0000	8	71 624	0 9.0'S	18 22.0'W	9	301.08	0017	6387.	5675.	180K	19	0000	0
AII	42	5	0002	0000	8	68 611	3 49.0'S	11 3.0'W	1	301.31	0002	3468.	3231.	059K	19	0000	0
AII	42	5	0001	0000	8	68 610	4 8.0'S	12 7.0'W	1	301.42	0001	3061.	2871.	134K	19	0000	0

MARSDEN SQUARE #302

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	20	2	0021	0000	8	66 314	0 28.5'S	20 31.0'W	1	302.00	0021	5760.	5390.		19	0000	0
AII	20	2	0022	0000	8	66 314	0 40.0'S	20 28.5'W	1	302.00	0022	6600.	6600.		19	0000	0
AII	20	2	0023	0000	8	66 315	0 43.6'S	20 25.0'W	1	302.00	0023	3843.	2815.		19	0000	0
CHN	35	2	0011	0000	8	63 3 9	1 27.0'S	29 14.0'W	1	302.19	0011	4353.	4353.	8.4K	15	0000	0

MARSDEN SQUARE #303

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	35	2	0003	0000	3	63 3 6	0 50.5'S	30 6.5'W	1	303.00	0003	4408.	4408.	097K	15	0000	0
CHN	35	2	0004	0000	8	63 3 7	0 57.0'S	30 8.0'W	1	303.00	0004	4320.	4320.	026K	15	0000	0
CHN	115	8	0155	0000	7	74 6 3	3 19.0'S	37 34.0'W	1	303.37	0015	285.	344.	030G	4	0000	0
CHN	115	8	0156	0000	8	74 6 3	3 20.3'S	37 22.8'W	1	303.37	0016	806.	284.	6.6K	4	0000	0
CHN	115	8	0157	0000	8	74 6 3	3 20.4'S	37 27.7'W	1	303.37	0017	266.	272.	043K	4	0000	0
CHN	115	7	0154	0000	8	74 528	4 43.5'S	35 2.0'W	1	303.45	0014	1085.	905.	5.9K	4	0000	0
CHN	35	2	0012	0000	11	63 313	7 38.5'S	34 37.0'W	1	303.74	0012	28.	28.	0000	14	0000	0
CHN	115	7	0151	0000	8	74 524	8 5.8'S	33 54.5'W	1	303.83	0011	2052.	1774.	103K	4	0000	0

MARSDEN SQUARE #322

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	93	12	0044	0000	8	76 919	5 20.6'S	131 54.4'E	2	322.51	0018	1551.	695.	500G	3	0000	0

MARSDEN SQUARE #326

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	100	6	0060	0000	8	71 531	4 0.2'S	90 46.9'E	9	326.40	0005	4881.	3960.	011K	15	0000	0

MARSDEN SQUARE #329

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	43	1	0052	0000	8	64 517	7 36.3'S	60 12.3'E	1	329.70	0021	3286.	3286.	010G	13	0000	0

MARSDEN SQUARE #330

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	43	1	0011	0000	8	64 4 9	1 37.0'S	53 21.0'E	1	330.13	0005	4784.	4088.	006K	10	0000	0
CHN	43	1	0017	0000	7	64 412	3 37.0'S	55 42.0'E	1	330.35	0001	2618.	2618.	3.8K	3	0000	0
CHN	43	1	0063	0000	8	64 521	5 14.0'S	55 19.5'E	1	330.55	0023	1497.	1497.	3.9K	13	0000	0
CHN	43	1	0018	0000	8	64 416	6 49.0'S	57 22.0'E	1	330.67	0007	2776.	2826.	025G	13	0000	0
CHN	43	1	0060	0000	7	64 520	6 4.0'S	57 7.0'E	1	330.67	0004	1913.	1913.	007G	13	0000	0
CHN	43	1	0061	0000	8	64 520	6 0.0'S	57 5.0'E	1	330.67	0022	1763.	1763.	075G	13	0000	0
CHN	43	1	0020	0000	8	64 417	7 2.0'S	59 22.0'E	1	330.79	0008	3127.	2984.	004G	13	0000	0

MARSDEN SQUARE #355

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	100	9	0090	0000	8	71 816	13 17.5'S	166 6.8'E	9	355.36	0016	7094.	6485.	5.9K	21	0000	0
CHN	100	9	0086	0000	8	71 813	14 47.1'S	168 9.2'E	9	355.48	0015	2671.	2291.	045K	21	0000	0
CHN	100	9	0081	0000	8	71 8 9	17 52.4'S	167 20.6'E	9	355.77	0014	4815.	4746.	044K	17	0000	0

MARSDEN SQUARE #356

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	100	8	0066	0000	8	71 723	10 43.8'S	152 8.4'E	9	356.02	0010	3271.	3215.	1.8K	21	0000	0

MARSDEN SQUARE #359

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	100	7	0061	0000	8	71 711	12 40.2'S	123 33.4'E	9	359.23	0006	127.	238.	3.9K	2	0000	0
CHN	100	7	0064	0000	8	71 712	12 39.6'S	123 33.0'E	9	359.23	0009	239.	242.	012K	2	0000	0

MARSDEN SQUARE #365

CHN	43	1	0044	0000	8	64 514	10 50.5'S	60 8.8'E	1	365.00	0016	1320.	1320.	680G	13	0000	0
CHN	43	1	0039	0000	8	64 512	13 22.5'S	60 57.0'E	1	365.30	0014	1455.	1455.	340G	13	0000	0
CHN	43	1	0037	0000	8	64 511	13 35.0'S	61 12.0'E	1	365.31	0013	2131.	2131.	1.6K	13	0000	0
CHN	43	1	0035	0000	8	64 510	14 34.0'S	60 21.0'E	1	365.40	0012	55.	55.	4.5K	13	0000	0

MARSDEN SQUARE #366

CHN	43	1	0026	0000	8	64 424	17 22.5'S	59 10.0'E	1	366.79	0011	830.	792.	454G	13	0000	0

MARSDEN SQUARE #400

AII	93	6	0011	0000	8	76 317	24 58.8'S	70 0.7'E	9	400.40	0010	3512.	3522.	104K	16	0000	0
AII	93	6	0012	0000	8	76 317	24 40.5'S	70 2.7'E	9	400.50	0011	3445.	3323.	043K	14	0000	0
AII	93	6	0015	0000	8	76 328	25 46.8'S	70 11.0'E	9	400.50	0014	3521.	3097.	024K	16	0000	0

MARSDEN SQUARE #401

AII	93	6	0014	0000	8	76 328	25 42.6'S	69 33.5'E	9	401.59	0013	3609.	3256.	086K	14	0000	0
AII	93	6	0018	0000	8	76 330	25 35.5'S	69 55.8'E	9	401.59	0016	3865.	3079.	040K	16	0000	0

MARSDEN SQUARE #407

AII	93	2	0020	0000	8	751213	24 43.2'S	6 34.2'E	9	407.46	0020	1800.	1190.	035K	15	0000	0
AII	93	2	0021	0000	8	751214	25 26.0'S	6 42.2'E	9	407.56	0021	3160.	2625.	004K	15	0000	0
AII	93	2	0019	0000	8	751212	26 28.7'S	6 15.3'E	9	407.66	0019	2450.	2400.	033K	15	0000	0
AII	93	2	0017	0000	8	751210	29 32.8'S	3 5.7'E	9	407.93	0017	2787.	1850.	072K	15	0000	0

MARSDEN SQUARE #408

AII	93	2	0009	0000	8	7512 5	34 10.6'S	1 29.7'W	9	408.41	0009	1925.	1765.	022K	15	0000	0
AII	93	2	0010	0000	8	7512 5	34 20.5'S	1 34.6'W	9	408.41	0010	2284.	1935.	056K	15	0000	0
AII	93	2	0011	0000	8	7512 6	32 58.2'S	0 1.1'W	9	408.41	0011	3109.	2367.	088K	15	0000	0
AII	93	2	0007	0000	8	7512 4	34 30.0'S	3 27.9'W	9	408.43	0007	2220.	2130.	001K	15	0000	0
AII	93	2	0008	0000	8	7512 4	34 30.0'S	3 28.4'W	9	408.43	0008	1984.	1488.	058K	15	0000	0
AII	93	2	0006	0000	8	7512 3	34 21.0'S	4 59.0'W	9	408.44	0006	2460.	2360.	037K	15	0000	0
AII	93	2	0005	0000	8	7512 3	34 17.3'S	5 2.1'W	9	408.45	0005	3101.	3012.	051K	15	0000	0
AII	93	2	0004	0000	8	7512 1	36 22.7'S	7 30.7'W	9	408.67	0004	2184.	1925.	013K	15	0000	0
AII	93	2	0003	0000	8	7512 1	37 8.3'S	7 49.5'W	9	408.77	0003	2650.	1940.	034K	15	0000	0

MARSDEN SQUARE #409

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	107	7	0025	0000	8	80 5 9	31 50.0'S	13 34.7'W	9	409.13	0025	2984.	2364.	044K	16	0000	0
AII	107	7	0023	0000	8	80 5 8	32 40.6'S	14 1.1'W	9	409.24	0023	2634.	2087.	007K	16	0000	0
AII	107	7	0020	0000	8	80 5 6	33 42.8'S	14 15.0'W	9	409.34	0020	2283.	1489.	031K	16	0000	0
AII	107	7	0018	0000	8	80 5 5	34 33.2'S	15 8.8'W	9	409.45	0018	2824.	2464.	400K	16	0000	0
AII	93	2	0001	0000	8	751128	34 59.0'S	16 8.0'W	9	409.46	0001	3576.	2283.	015K	15	0000	0
AII	107	7	0017	0000	8	80 5 5	35 16.7'S	15 44.1'W	9	409.55	0017	3638.	3135.	300K	16	0000	0
AII	107	7	0015	0000	8	80 5 3	36 33.5'S	17 35.2'W	9	409.67	0015	2683.	2434.	237K	16	0000	0
AII	107	7	0016	0000	8	80 5 4	36 4.4'S	18 5.0'W	9	409.68	0016	2623.	2284.	025K	16	0000	0
AII	107	7	0013	0000	8	80 5 2	37 50.0'S	17 8.5'W	9	409.77	0013	2723.	1885.	013K	16	0000	0
AII	107	7	0014	0000	8	80 5 2	37 11.2'S	17 30.9'W	9	409.77	0014	2454.	2224.	350K	16	0000	0
AII	107	7	0010	0000	8	80 430	38 52.9'S	16 14.4'W	9	409.86	0010	2384.	1954.	020K	16	0000	0
AII	107	7	0011	0000	8	80 430	38 10.9'S	16 33.7'W	9	409.86	0011	2490.	2209.	1.6K	16	0000	0
AII	107	7	0009	0000	8	80 429	39 41.8'S	16 3.2'W	9	409.96	0009	2314.	2633.	101K	16	0000	0

MARSDEN SQUARE #411

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
CHN	115	6	0146	0000	8	74 511	30 12.8'S	39 21.5'W	1	411.09	0009	4789.	4139.	133K	13	0000	0

MARSDEN SQUARE #443

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	93	2	0014	0000	8	7512 8	31 59.5'S	2 24.2'E	9	443.12	0014	2304.	1587.	175K	15	0000	0
AII	93	2	0012	0000	8	7512 7	32 39.9'S	1 35.3'E	9	443.20	0012	3090.	2827.	001K	15	0000	0
AII	93	2	0013	0000	8	7512 7	32 39.1'S	1 36.0'E	9	443.21	0013	2307.	2215.	014K	15	0000	0

MARSDEN SQUARE #445

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	107	7	0007	0000	8	80 428	40 26.3'S	16 45.0'W	9	445.06	0007	2627.	2597.	390K	16	0000	0
AII	107	7	0006	0000	8	80 427	41 14.9'S	16 36.2'W	9	445.16	0006	2614.	2175.	114K	16	0000	0
AII	107	7	0004	0000	8	80 426	42 54.9'S	16 22.2'W	9	445.26	0004	3085.	2519.	183K	16	0000	0
AII	107	7	0002	0000	8	80 422	46 12.7'S	14 4.4'W	9	445.64	0002	2485.	2913.	170K	16	0000	0

MARSDEN SQUARE #480

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	107	6	0031	0000	8	80 320	54 41.4'S	0 2.3'W	12	480.40	0031	829.	884.	046K	14	0000	0
AII	107	6	0032	0000	8	80 320	54 39.7'S	0 0.8'W	12	480.40	0032	891.	900.	010K	14	0000	0
AII	107	6	0033	0000	8	80 321	54 39.0'S	0 4.1'W	12	480.40	0033	937.	987.	050K	14	0000	0
AII	107	6	0034	0000	8	80 321	54 38.1'S	0 7.6'W	12	480.40	0034	1060.	1082.	017K	14	0000	0
CHN	115	4	0037	0000	8	74 225	54 35.9'S	0 58.1'W	9	480.40	0001	2522.	2328.	093K	14	0000	0
CHN	115	4	0044	0000	8	74 3 6	54 40.2'S	0 1.2'W	9	480.40	0005	861.	818.	091K	16	0000	0
CHN	115	4	0038	0000	8	74 227	55 20.2'S	1 42.6'W	9	480.51	0003	3509.	3419.	9.5K	14	0000	0
CHN	115	4	0042	0000	8	74 3 4	55 22.5'S	2 1.9'W	9	480.52	0004	2540.	2461.	1.8K	15	0000	0
ISO	1	1	0045	0000	8	761120	55 37.5'S	3 48.9'W	9	480.53	0045	3600.	3050.	100K	19	0000	0
ISO	1	1	0047	0000	8	761121	55 36.2'S	3 43.7'W	9	480.53	0047	2150.	1450.	035K	19	0000	0
ISO	1	1	0048	0000	8	761121	55 41.2'S	3 49.1'W	9	480.53	0048	4390.	3700.	0.1K	19	0000	0
MEL	1	5	0023	0000	8	8012 0	55 47.1'S	3 55.7'W	9	480.53	0023	5378.	3321.	256K	19	0000	0
MEL	1	5	0018	0000	8	8012 0	55 51.9'S	4 17.4'W	9	480.54	0018	2488.	2032.	135K	19	0000	0

MARSDEN SQUARE #480

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
MEL	1	5	0019	0000	8	8012 0	55 51.1'S	4 19.3'W	9	480.54	0019	2835.	2835.	100K	19	0000	0
MEL	1	5	0020	0000	8	8012 0	55 50.0'S	4 25.3'W	9	480.54	0020	4782.	3221.	123K	19	0000	0
MEL	1	5	0021	0000	8	8012 0	55 50.7'S	4 25.3'W	9	480.54	0021	4456.	3490.	283K	19	0000	0
MEL	1	5	0022	0000	8	8012 0	55 46.9'S	4 39.2'W	9	480.54	0022	4560.	4361.	025K	19	0000	0
MEL	1	5	0024	0000	8	8012 0	56 2.6'S	4 42.1'W	9	480.64	0024	3295.	3227.	046K	16	0000	0
MEL	1	5	0025	0000	8	8012 0	56 17.0'S	4 39.2'W	9	480.64	0025	3294.	3095.	002K	16	0000	0
MEL	1	5	0026	0000	8	8012 0	56 36.8'S	4 26.8'W	9	480.64	0026	3984.	3523.	020K	19	0000	0
MEL	1	5	0027	0000	8	8012 0	56 53.6'S	6 2.6'W	9	480.66	0027	2379.	2495.	047K	16	0000	0
MEL	1	5	0028	0000	8	8012 0	56 57.6'S	6 7.5'W	9	480.66	0028	3098.	2822.	017K	16	0000	0
MEL	1	5	0029	0000	8	8012 0	57 3.3'S	6 4.0'W	9	480.76	0029	3589.	3648.	017K	16	0000	0
MEL	1	5	0031	0000	8	8012 0	57 34.4'S	6 59.1'W	9	480.76	0031	3808.	3500.	097K	16	0000	0
MEL	1	5	0030	0000	8	8012 0	57 28.1'S	7 0.6'W	9	480.77	0030	4074.	3794.	122K	16	0000	0
MEL	1	5	0032	0000	8	8012 0	57 42.6'S	7 39.5'W	9	480.77	0032	3152.	2543.	031K	19	0000	0
MEL	1	5	0033	0000	8	8012 0	57 46.3'S	7 40.6'W	9	480.77	0033	3944.	2797.	088K	19	0000	0
MEL	1	5	0034	0000	8	8012 0	57 46.9'S	7 40.3'W	9	480.77	0034	3983.	3684.	047K	19	0000	0
MEL	1	5	0035	0000	8	8012 0	57 57.0'S	7 48.7'W	9	480.77	0035	3479.	2920.	317K	14	0000	0
MEL	1	5	0036	0000	8	8012 0	58 8.9'S	9 45.8'W	9	480.89	0036	3414.	2779.	084K	14	0000	0

MARSDEN SQUARE #481

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
MEL	1	5	0037	0000	8	8012 0	58 25.8'S	15 39.7'W	9	481.85	0037	4104.	3319.	108K	19	0000	0
MEL	1	5	0038	0000	8	8012 0	58 27.2'S	15 29.2'W	9	481.85	0038	3233.	2966.	075K	19	0000	0
MEL	1	5	0039	0000	8	8012 0	58 39.1'S	16 12.7'W	9	481.86	0039	3958.	3822.	195K	16	0000	0
MEL	1	5	0040	0000	8	8012 0	58 59.4'S	16 19.0'W	9	481.86	0040	4476.	4372.	075K	16	0000	0
MEL	1	5	0041	0000	8	8012 0	59 5.2'S	16 48.5'W	9	481.94	0041	4645.	3379.	064K	19	0000	0
MEL	1	5	0043	0000	8	81 2 0	59 44.9'S	17 58.4'W	9	481.97	0043	2594.	2502.	015K	16	0000	0
MEL	1	5	0042	0000	8	8012 0	58 21.8'S	18 3.6'W	9	481.98	0042	3984.	3832.	044K	16	0000	0

MARSDEN SQUARE #484

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	107	6	0001	0000	8	80 3 9	56 10.2'S	41 48.0'W	12	484.61	0001	3809.	3402.	068K	12	0000	0
AII	107	6	0002	0000	8	80 3 9	56 7.3'S	41 41.1'W	12	484.61	0002	2438.	2959.	1.4K	12	0000	0

MARSDEN SQUARE #514

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
ISO	1	1	0075	0000	8	7612 9	52 54.0'S	11 23.3'E	9	514.21	0075	1940.	1760.	010K	19	0000	0

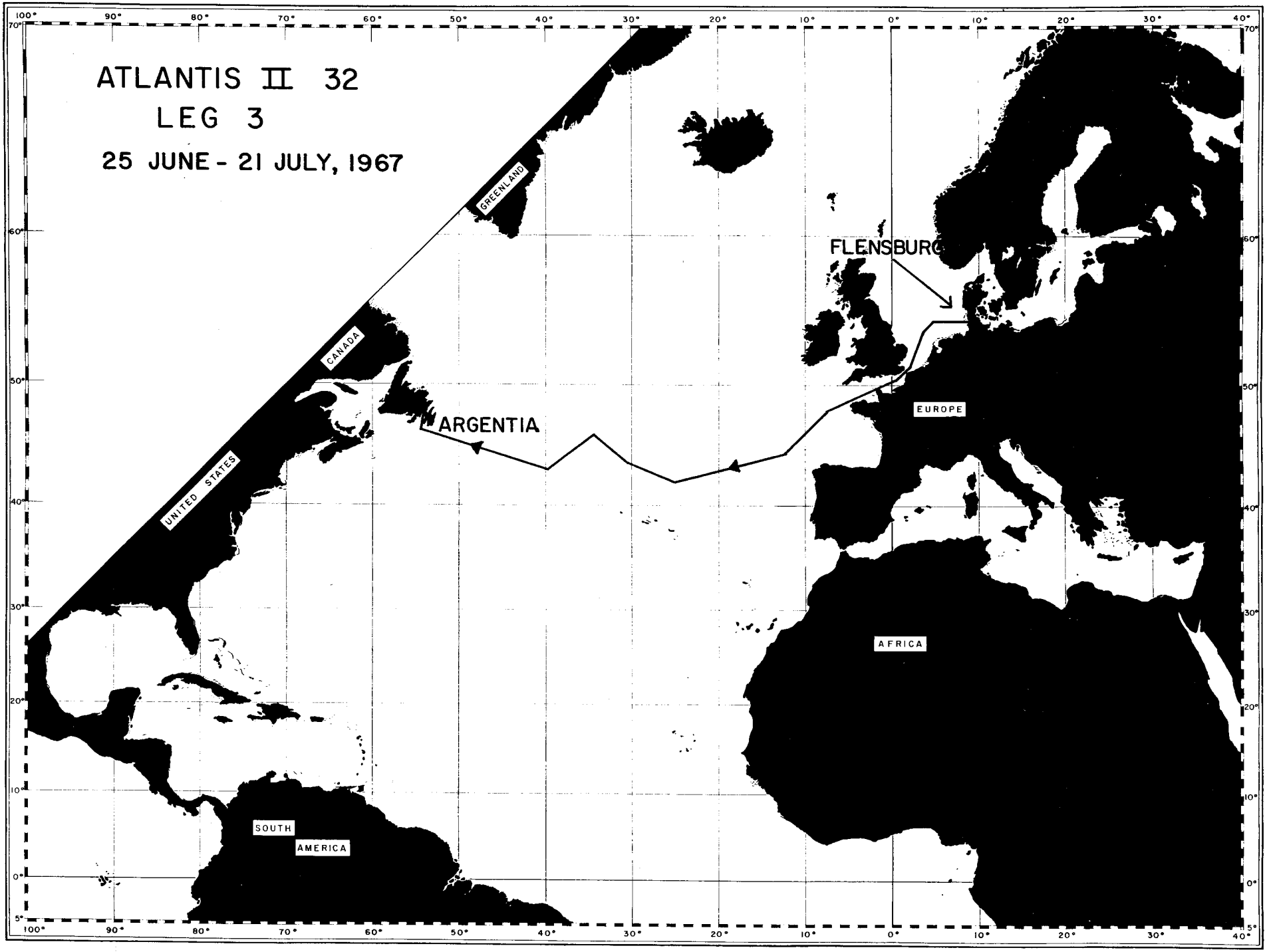
MARSDEN SQUARE #515

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	107	6	0046	0000	8	80 323	53 58.9'S	3 35.6'E	12	515.33	0046	2176.	2252.	0.2K	16	0000	0
ISO	1	1	0061	0000	8	7612 1	53 59.7'S	6 25.0'E	9	515.36	0061	4720.	4570.	003K	19	0000	0
ISO	1	1	0062	0000	8	7612 2	53 54.2'S	6 20.5'E	9	515.36	0062	2835.	2300.	054K	19	0000	0
ISO	1	1	0063	0000	8	7612 2	53 51.5'S	6 24.1'E	9	515.36	0063	3110.	2560.	004K	19	0000	0
AII	107	6	0058	0000	8	80 326	53 58.8'S	7 20.4'E	12	515.37	0058	1507.	1316.	071K	12	0000	0
AII	107	6	0060	0000	8	80 327	53 25.7'S	9 9.1'E	12	515.39	0060	5899.	4207.	070K	19	0000	0
AII	107	6	0061	0000	8	80 328	53 25.1'S	9 11.9'E	12	515.39	0061	5073.	4063.	060K	19	0000	0

MARSDEN SQUARE #515

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE
AII	107	6	0063	0000	8	80 328	53 23.3'S	9 20.3'E	12	515.39	0063	4051.	4180.	012K	19	0000	0
AII	107	6	0064	0000	8	80 328	53 19.2'S	9 8.4'E	12	515.39	0064	5024.	3874.	003K	19	0000	0
AII	107	6	0065	0000	8	80 328	53 14.3'S	9 11.6'E	12	515.39	0065	4729.	2692.	022K	19	0000	0
AII	107	6	0066	0000	8	80 328	53 8.8'S	9 11.5'E	12	515.39	0066	2619.	2214.	068K	19	0000	0
AII	107	6	0067	0000	8	80 329	53 14.4'S	9 27.6'E	12	515.39	0067	5311.	4025.	024K	19	0000	0
AII	107	6	0035	0000	8	80 321	54 43.4'S	0 48.2'E	12	515.40	0035	584.	651.	048K	14	0000	0
AII	107	6	0036	0000	8	80 321	54 42.9'S	0 49.4'E	12	515.40	0036	745.	941.	028K	14	0000	0
AII	107	6	0037	0000	8	80 322	54 44.2'S	0 50.3'E	12	515.40	0037	1196.	789.	009K	14	0000	0
AII	107	6	0039	0000	8	80 322	54 26.5'S	1 37.3'E	12	515.41	0039	5022.	4436.	025K	19	0000	0
AII	107	6	0040	0000	8	80 322	54 25.4'S	1 34.2'E	12	515.41	0040	3701.	2724.	068K	19	0000	0
AII	107	6	0041	0000	8	80 322	54 25.1'S	1 28.4'E	12	515.41	0041	1907.	1983.	1.4K	19	0000	0
AII	107	6	0043	0000	8	80 323	54 24.4'S	0 19.8'E	12	515.41	0043	2095.	2272.	0.4K	19	0000	0
AII	107	6	0047	0000	8	80 324	54 0.7'S	3 33.1'E	12	515.43	0047	2069.	1895.	043K	16	0000	0
AII	107	6	0048	0000	8	80 324	54 1.8'S	3 31.3'E	12	515.43	0048	1901.	2178.	016K	16	0000	0
AII	107	6	0051	0000	8	80 325	54 11.9'S	4 35.6'E	12	515.44	0051	3142.	2536.	006K	19	0000	0
AII	107	6	0052	0000	8	80 325	54 25.5'S	4 43.9'E	12	515.44	0052	973.	1001.	064K	12	0000	0
CHN	115	4	0050	0000	8	74 3 8	54 13.7'S	4 3.1'E	9	515.44	0008	1806.	1938.	9.2K	19	0000	0
AII	107	6	0053	0000	8	80 325	54 13.5'S	5 10.5'E	12	515.45	0053	2810.	2364.	018K	16	0000	0
AII	107	6	0055	0000	8	80 326	54 17.6'S	5 18.5'E	12	515.45	0055	2355.	2010.	033K	16	0000	0
AII	107	6	0056	0000	8	80 326	54 23.8'S	5 8.2'E	12	515.45	0056	3664.	3122.	036K	16	0000	0
ISO	1	1	0056	0000	8	761130	54 5.5'S	6 17.1'E	9	515.46	0056	4390.	3650.	045K	19	0000	0
ISO	1	1	0057	0000	8	7612 1	54 8.3'S	6 29.3'E	9	515.46	0057	3100.	2830.	001K	19	0000	0
ISO	1	1	0058	0000	8	7612 1	54 4.3'S	6 23.9'E	9	515.46	0058	3580.	2960.	112K	19	0000	0
ISO	1	1	0059	0000	8	7612 1	54 3.4'S	6 30.0'E	9	515.46	0059	2520.	2340.	150K	19	0000	0
ISO	1	1	0060	0000	8	7612 1	54 2.7'S	6 29.2'E	9	515.46	0060	2780.	2500.	159K	19	0000	0
AII	107	6	0057	0000	8	80 325	54 2.7'S	7 13.4'E	12	515.47	0057	3648.	1920.	034K	16	0000	0
AII	107	6	0059	0000	8	80 327	54 1.1'S	7 14.1'E	12	515.47	0059	3501.	2520.	011K	16	0000	0

DESCRIPTIONS OF W.H.O.I. ROCK DREDGE SAMPLES, VOLUME II.


ATLANTIS III 32
LEG 3
25 JUNE - 21 JULY, 1967
GREENLAND
CANADA
UNITED STATES
FLENSBURG
ARGENTIA
EUROPE
AFRICA
SOUTH
AMERICA

********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	32	3	0001	0000	8	67 7 8	42 59.5'N	27 42.2'W	9	147.27	0001	3041.	2778.	TR	15	0000	0	
AII	32	3	0002	0000	8	67 7 8	42 57.5'N	27 40.7'W	9	147.27	0002	2853.	2532.	TR	15	0000	0	
AII	32	3	0003	0000	8	67 7 9	43 1.8'N	28 13.5'W	9	147.38	0003	1465.	1315.	11K	15	0000	0	
AII	32	3	0004	0000	8	67 7 9	43 3.2'N	28 15.2'W	9	147.38	0004	1353.	1129.	TR	15	0000	0	
AII	32	3	0005	0000	8	67 710	43 6.4'N	28 31.0'W	9	147.38	0005	1483.	1371.	4K	15	0000	0	
AII	32	3	0006	0000	8	67 710	43 7.4'N	28 25.6'W	9	147.38	0006	2344.	1689.	TR	15	0000	0	
AII	32	3	0007	0000	8	67 711	43 11.4'N	28 58.7'W	9	147.33	0007	3193.	2532.	TR	16	0000	0	
AII	32	3	0008	0000	8	67 711	43 12.6'N	28 56.0'W	9	147.38	0008	2532.	2250.	138K	16	0000	0	
AII	32	3	0009	0000	8	67 711	43 12.4'N	28 54.7'W	9	147.38	0009	1847.	1557.	TR	16	0000	0	
AII	32	3	0010	0000	8	67 711	43 13.5'N	29 9.6'W	9	147.39	0010	2268.	1913.	.7K	16	0000	0	
AII	32	3	0011	0000	8	67 712	42 57.3'N	29 15.5'W	9	147.29	0011	2174.	1988.	155K	16	0000	0	
AII	32	3	0012	0000	8	67 712	42 57.6'N	29 12.1'W	9	147.29	0012	1820.	1440.	15K	16	0000	0	
AII	32	3	0013	0000	8	67 712	42 55.5'N	29 7.8'W	9	147.29	0013	1279.	1054.	6K	16	0000	0	
AII	32	3	0014	0000	8	67 713	42 59.5'N	29 16.6'W	9	147.29	0014	2910.	2703.	TR	16	0000	0	
AII	32	3	0015	0000	8	67 713	43 1.0'N	29 18.2'W	9	147.39	0015	2344.	2118.	85G	16	0000	0	
AII	32	3	0016	0000	8	67 714	43 14.8'N	29 21.3'W	9	147.39	0016	2778.	2325.	TR	15	0000	0	
AII	32	3	0017	0000	8	67 714	43 19.8'N	29 14.2'W	9	147.39	0017	1913.	1596.	TR	15	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 1 DREDGE 1 DESCRIBED BY Geoff Thompson DATE July 8, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1-1	Mud	4 Jars	-	Foram rich.	-	—	—	—	—	-	4 of 4 Jars missing.
1-2	Mud	1 Jar	-	Foram rich.	-	—	—	—	—	-	From pipe dredge.
1-3	- - - - - Pipe		dredge -	stored	in plastic bottle.						
1-4	Carbonate Sed.	6 pcs.	-	-	-	—	—	—	—	Lithified.	Hard crystalline, 2 cm - 5 mm.
1-5	Plutonic	-	-	Quartz.	Dark mineral.	—	—	—	—	-	2 cm long.
1-6	Plutonic	2 pcs.	-	Quartz rich?	-	—	—	—	✓	-	1/2 cm and 5 mm in size.
1-7	"Granitic"	1 pc.	-	-	-	—	—	—	—	-	3-4 mm in size.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 2 DREDGE 2 DESCRIBED BY Geoff Thompson DATE July 8, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2-1	Foram rich clay	3 jars	-	-	-	—	—	—	—	With some mineral grains and pteropods.	
2-2	Foram rich clay	1 btl.	-	-	-	—	—	—	—	With some mineral grains, abundant pteropods.	
2-3	Large shells	-	-	Pelecypods (?)	and coiled pteropods.	-	-	-	-	-	From pipe dredge.
2-4	Shells	-	-	Gastropods (?)	and coiled pteropods	(?)	-	-	-	-	From pipe dredge.
2-5	Mn Crust	-	-	Attached coral.		—	—	—	✓	-	3-4 cm in length.
2-6	Carbonate Sed.	9 pcs.	-	-	-	—	—	✓	-	Lithified.	2cm - 5mm in size.
2-7	Carbonate Sed.	10 pcs.	-	-	-	—	—	✓	-	Lithified.	1 - 3cm in size.
2-8	Plutonic	10 frags.	-	Quartz rich.	-	—	—	✓	-	-	0.5 - 1cm in size.
2-9	Cinder (?)	2 pcs.	-	-	-	—	—	—	—	-	Scoriaceous.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 3 DREDGE 3 DESCRIBED BY Geoff Thompson DATE July 9, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
3-1	Foram rich clay	1¼-1 gal jars	-	-	-	—	—	—	—	Pipe dredge:	Abundant shells, corals, rocks and minerals.
3-2	Foram rich clay	1½-1 gal jars	-	-	-	—	—	—	—	Main dredge:	Abundant shells, corals, rocks and minerals.
3-3	Coral	1 jar	-	-	-	—	—	—	—	-	Some coral fragments.
3-4	Sponge	-	-	-	-	—	—	—	—	-	Preserved in formalin.
3-5	Shell fragment	-	-	-	-	—	—	—	—	-	3 cm in size.
3-6	Pebbles	-	-	Quartz rich.	-	—	—	—	✓	-	12 in #, 0.5 - 2 cm.
3-7	Erratic	0.2	-	Quartz rich.	-	—	—	—	✓	Rounded.	-
3-8	Erratic	0.06	-	Quartz rich.	-	—	—	—	✓	Rounded.	Pebble sized.
3-9	Metamorphic	0.2	-	Quartz-Mica.	-	—	—	—	—	-	Erratic (?)
3-10	Basalt	7.7	-	-	(1 cm) OL & Pg.	✓	-	2	-	-	With biogenous material on underside.
3-11	Erratic	3.2	-	Quartz rich.	-	—	—	✓	-	-	With small coral base.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 4 DREDGE 4 DESCRIBED BY Geoff Thompson DATE July 9, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
4-1	Coarse Foram Ooze	½-1 gal.jar	-	-	-	—	—	—	—	Included pteropods, shell and rock fragments.	
4-2	Biogenous Matter	5 jars	-	(Brittle stars,	sponges, sea whips,	coral,	wood	etc.)			Preserved in formalin.
4-3	Coral	1 bag	-	-	-	—	—	—	—	-	Dead.
4-4	Calcareous Ooze	20 pcs.	-	-	-	—	—	✓	-	Consolidated.	1-10 cm in size, burrowed.
4-5	Erratics	0.2	-	-	-	—	—	—	—	-	Some pebbles.
4-6	Carbonate Sed.	5 pcs.	-	-	-	—	—	—	—	Lithified.	2-6 cm in size.
4-7	Basalt	2 pcs.	-	-	-	—	—	—	✓	-	Small fragments.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 5 DREDGE 5 DESCRIBED BY Geoff Thompson DATE July 10, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
5-1	Coarse Ooze	1 jar	-	-	-	—	—	—	—	-	With coral, shell and rock fragments.
5-2	Biogenous Matter	11 jars	-	Living and dead organisms, living organisms preserved on formalin.							
5-3	Coral	1 bag	-	-	-	—	—	—	—	-	Dead.
5-4	Coarse Ooze	1 bag	-	(Unwashed).	-	—	—	—	—	Included shell, coral, and rock fragments	
5-5	Calcareous Ooze	1½-1 gal.jars	-	(Washed).	-	—	—	—	—	-	Contains more fines then 5-4.
5-6	Basalt	2.3	-	-	-	—	—	✓	✓	-	With dead coral on upper surface.
5-7	Basalt	0.5	-	No glass.	-	—	—	✓	✓	-	Upper surface of lava flow?
5-8	Basalt	0.2	-	(Similar to 5-6).	-	—	—	—	—	-	Rounded.
5-9	Carbonate Sed.	0.5	-	-	-	—	—	✓	✓	Lithified.	Hard, crystalline.
5-10	Calcareous Ooze	1 jar	-	-	-	—	—	—	—	Consolidated and burrowed.	With many rock, shell and mineral fragments.
5-11	Calcareous Ooze	1 jar	-	-	-	—	—	—	—	Consolidated.	With forams and sponge spicules.
5-12	Erratics	0.2	-	-	-	—	—	—	✓	-	Cobble sized.
5-13	15 Pebbles	-	-	-	-	—	—	✓	✓	-	1-3 cm in size.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 6 DREDGE 6 DESCRIBED BY Geoff Thompson DATE July 10, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
6-1	Calcareous Ooze	1 gal. jar	-	-	-					-	With shell and rock fragments.
6-2	Calcareous Ooze	1 jar	-	-	-					-	With clay, shell fragments and rock pebbles.
6-3	Carbonate Sed.	2 pcs.	-	-	-					Lithified.	Pebble sized.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 7 DREDGE 7 DESCRIBED BY Geoff Thompson DATE July 10, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
7-1	Calcareous Ooze	1-1 gal.jar.	-	Shell and rock fragments.	-	-	-	-	-	-	Also, 1 - jar "Fines".
7-2	Rock fragments	-	-	Serpentine.	-	-				-	With some pebbles & shells.
7-3	Calcareous Ooze	1 jar	-	-	-	-				-	With clay and rock fragments.
7-4	Fragments	2 pebbles (2 cm), 1-lithified carbonate and 1-serpentinite.									

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 8 DREDGE 8 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-1	Clay	2-1 gal. jars	-	-	-					With ooze, shells and rock fragments.	
8-2	Coarse sand/ pebbles	1-5 gal cans	-	Mostly serpentine.	-					Serpentinized peridotite.	Pebbles up to 3 cm in size.
8-3	Peridotite Boulder	8.6	-	-	-				H	Serpentinized.	In burlap bag.
8-4	"	>9.0	-	-	-				M	"	" "
8-5	"	>9.0	-	-	-				H	"	" "
8-6	"	6.8	-	-	-				M	"	" "
8-7	"	>9.0	-	-	-				M	"	Some crystalline calcite.
8-8	"	>9.0	-	-	-				M	"	In burlap bag.
8-9	"	3.6	-	-	-				M	Serpentinized.	" "
8-10	"	9.1	-	-	-				M	"	" "
8-11	Peridotite	2.7	-	-	-				✓	Serpentinized.	" "
8-12	Peridotite	2.3	-	-	-				✓	"	" "
8-13	Peridotite	2.3	-	-	-				✓	"	" "
8-14	Peridotite	1.8	-	-	-				✓	"	" "
8-15	Peridotite	0.5	-	-	-				✓	"	" "
8-16	Peridotite	0.5	-	-	-				✓	"	" "
8-17	Peridotite	0.5	-	-	-				✓	"	" "
8-18	Serpentinite	2.3	-	-	-				VH	Talc ?	" "

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 8 DREDGE 8 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-19	Serpentinite	2.3	-	-	-	—	—	—	VH	Talc ?	In burlap bag.
8-20	Peridotite	9.1	-	-	-	—	—	—	✓	Serpentinized.	" "
8-21	Serpentinite	0.7	-	-	-	—	—	—	✓	-	" "
8-22	Serpentinite	0.5	-	-	-	—	—	—	✓	-	" "
8-23	Peridotite	0.5	-	-	-	—	—	—	✓	Serpentinized.	" "
8-24	Peridotite	"	-	-	-	—	—	—	✓	"	" "
8-25	Peridotite	0.3	-	-	-	—	—	—	✓	"	Banded structure.
8-26	Peridotite	"	-	-	-	—	—	—	✓	"	Stored in can.
8-27	Peridotite	0.2	-	-	-	—	—	—	✓	"	"
8-28	Peridotite	0.3	-	-	-	—	—	—	✓	"	"
8-29	Peridotite	"	-	-	-	—	—	—	✓	"	Talc (?) on surface, in can.
8-30	Serpentinite	"	-	-	-	—	—	—	✓	-	Thin layer consolidated ooze on surface.
8-31	Peridotite	0.2	-	-	-	—	—	—	✓	Serpentinized.	With consolidated ooze and calcite filled veins.
8-32	Ooze	0.9	-	-	-	—	—	✓	-	Consolidated .	Broken from top of serpentinized peridotite.
8-33	Ooze	0.2	-	-	-	—	—	—	—	"	With burrows and very few rock fragments.
8-34	Ooze	0.2	-	-	-	—	—	—	—	"	Many rock and mineral fragments.
8-35	Ooze	0.2	-	-	-	—	—	—	—	"	" " "
8-36	Ooze	0.1	-	-	-	—	—	—	—	"	" " "

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 8 DREDGE 8 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-37	Peridotite	0.5	-	-	-				VH	Serpentinized.	Thin layer of consolidated ooze on surface.
8-38	Peridotite	0.2	-	-	-				"	"	" " "
8-39	Peridotite	0.5	-	-	-				"	"	" " "
8-40	Peridotite	0.3	-	-	-				"	"	" " "
8-41	Peridotite	0.9	-	-	-				"	"	" " "
8-42	Peridotite	1.4	-	-	-				"	"	" " "
8-43	Peridotite	0.3	-	-	-				"	"	" " "
8-44	Peridotite	0.3	-	-	-				"	"	" " "
8-45	Peridotite	0.2	-	-	-				"	"	" " "
8-46	Peridotite	0.2	-	-	-				"	"	" " "
8-47	Peridotite	0.2	-	-	-				"	"	" " "
8-48	Peridotite	0.1	-	-	-				"	"	" " "
8-49	Peridotite	0.2	-	-	-				"	"	" " "
8-50	Peridotite	0.2	-	-	-				"	"	" " "
8-51	Peridotite	0.1	-	-	-				"	"	" " "
8-52	Peridotite	0.1	-	-	-				"	"	" " "
8-53	Peridotite/assorted rocks	0.9 total	-	-	-				"	"	" " "
8-54	Serpentinite	2.5	-	-	-					-	Banded Structure.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 8 DREDGE 8 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-55	Serpentinite	0.1	-	-	-	—	—	—	—	-	Banded structure.
8-56	Peridotite	0.5	-	-	-	—	—	—	—	Serpentinized	with consolidated ooze.
8-57	Calcite	0.1	-	-	-	—	—	—	—	-	3 cm band of crystalline calcite.
8-58	Peridotite	0.1	-	-	-	—	—	—	✓	-	With crystalline calcite surface.
8-59	Periditote	0.2	-	-	-	—	—	—	—	Serpentinized	with consolidated ooze.
8-60	Peridotite	0.1	-	-	-	—	—	—	✓	With fine needles of crystalline calcite.	
8-61	Peridotite	0.6	-	-	-	—	—	—	—	Serpentinized	with consolidated ooze.
8-62	Serpentine	0.1	-	-	-	—	—	—	VH	To talc (?)	
8-63	Ooze	0.1	-	-	-	—	—	—	—	Consolidated on crystal of serpentine.	
8-64	Ooze	0.1	-	-	-	—	—	—	—	4 pieces, consolidated.	Burrowed with very few rock fragments.
8-65	Peridotote	0.1	-	-	-	—	—	—	VH	Fiberous serpentine.	-
8-66	Serpentinite	0.1	-	-	Unknown fresh green crystal.	—	—	—	—	-	-
8-67	Rock fragment	0.2	-	Siliceous (?)	-	—	—	—	—	-	Serpentine on surface.
8-68	Erratic (?)	0.2	-	Siliceous.	-	—	—	—	—	-	Some rock fragments and consolidated ooze on surface.
8-69	Massive Serpentinite	0.7	-	-	-	—	—	—	—	-	With small piece of consolidated ooze.
8-70	Peridotite	0.5	-	-	-	—	—	—	✓	Serpentinized.	Banded structure.
8-71	Peridotite	0.5	-	-	-	—	—	—	—	Serpentinized.	-
8-72	Peridotite	0.6	-	-	-	—	—	—	✓	"	With radiating crystalline calcite.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 8 DREDGE 8 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-73	Peridotite	0.5	-	-	-					Serpentinized.	-
8-74	"	0.5	-	-	-					"	-
8-75	"	"	-	-	-					"	-
8-76	"	"	-	-	-					"	-
8-77	"	2.7	-	-	-					"	With 1 small piece of consolidated ooze.
8-78	"	0.7	-	-	-				VH	"	-
8-79	"Melange"	0.1	-	Mixture of consolidated ooze, serpentine and rock fragments.							-
8-80	Peridotite	0.5	-	-	-					Serpentinized.	Note massive serpentine veins on each side.
8-81	Serpentinite	0.2	-	-	-					-	-
8-82	Serpentinite "conglomerate"	0.2	-	-	-					-	With crystalline calcite on surface.
8-83	Rock	0.5	-	Light colored	-					Serpentine?	With many small green crystals on surface.
8-84	Serpentinites & peridotites	13.6	-	-	-				✔	-	Individual sample weights range from TR - 0.2 Kg.
8-85	"	"	-	-	-				✔	-	" "
8-86	"	0.2	-	-	-				✔	-	Fine fraction (gravel) from 8-25.
8-87	Peridotite	0.9	-	-	-				✔	Serpentinized.	With consolidated ooze on surface.
8-88	Peridodite	0.5	-	-	-				✔	Serpentinized.	No ooze.
8-89	Peridotite	0.5	-	-	-				✔	Serpentinized.	No ooze.
8-90	Peridotite	0.3	-	-	-				✔	Serpentinized.	With consolidated ooze on surface.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 8 DREDGE 8 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-91	Peridotite	0.5	-	-	-				✓	Serpentinized	With crystalline calcite.
8-92	Peridotite	1.8	-	-	-				✓	"	"
8-93	Ooze	0.2	-	-	-					Consolidated.	With rock and serpentine fragments.
8-94	Peridotite	0.1	-	-	-					-	With soft sediment ooze on surface.
8-95	Peridotite	0.1	-	-	-				✓	-	-
8-96	Erratic	0.1	-	Siliceous.	-					-	Garnet(?) crystal on outer surface.
8-97	Peridotite	9.1	-	-	-				VH	-	Covered by consolidated ooze with included rock and serpentine fragments.
8-98	Large crystal	0.1	C	Enstatite.	-					To talc.	-
8-99	Large crystal	0.1	C	Enstatite.	-					To talc.	-
8-100	Rock	0.2	-	-	∿ 50% enstatite					-	-
8-101	"Mountain Leather"	0.2	-	Serpentinite with tremolite.						-	-
8-102	"Mountain Leather"	0.1	-	"	" "					-	-
8-103	Rock	0.1	-	Talc rich.	-					-	-
8-104	Erratic	0.1	-	Quartzite.	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 9 DREDGE 9 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9-1	Ooze	1-1 gal.jar	-	-	-					-	With shell and rock fragments.
9-2	Serpentinite	0.1	-	-	-				VH	-	With four small pebbles of similar material.
9-3	Erratic	-	-	-	-					-	Pebble sized (2 cm).

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 10 DREDGE 10 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
10-1	Ooze	4 jars	-	-	-					-	With shell and rock fragments.
10-2	Peridotite (?)	0.1	-	-	-	-	-	✔	VH	-	-
10-3	Peridotite	0.2	-	-	-	-	-	✔	H	Serpentinized.	-
10-4	Peridotite	0.2	-	-	-	-	-	✔	H	Serpentinized.	-
10-5	Pebbles	0.2	-	Serpentine and	Peridotite.	-	-	✔	✔	-	0.1 - 4 cm in size.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-1	Coarse Ooze	1-1 gal. jar	-	-	-	—	—	—	—	-	With shell and rock fragments.
11-2	Coarse Ooze	1 jar	-	-	-	—	—	—	—	-	With shell and rock fragments.
11-3	Basalt	0.5	F	-	Large Ol.	—	—	—	—	-	Samples 11-3 thru 11-24 taken from pipe dredge.
11-4	Basalt	0.2	F	-	Lesser amounts of large Ol.	✓	—	—	—	-	-
11-5	Basalt	0.3	F	-	"	—	—	—	—	-	-
11-6	Basalt	0.3	F	-	"	—	—	—	—	-	-
11-7	Basalt	0.2	F	-	"	—	—	—	—	-	-
11-8	Basalt	0.2	F	-	"	—	—	—	—	-	-
11-9	Basalt	0.1	F	-	"	—	—	—	—	-	-
11-10	Basalt	0.5	F	-	"	—	—	—	—	-	10 small pieces.
11-11	Basalt	0.3	G	-	Scarce.	✓	—	—	—	-	With glass.
11-12	Basalt	0.1	G	-	"	✓	—	—	—	-	"
11-13	Basalt	0.1	G	-	"	✓	—	—	—	-	"
11-14	Basalt	0.1	G	-	"	✓	—	—	—	-	"
11-15	Basalt	0.1	G	-	"	✓	—	—	—	-	"
11-16	Basalt	0.1	G	-	"	✓	—	—	—	-	"
11-17	Basalt	0.1	G	-	"	✓	-	-	✓	-	With weathered glass.
11-18	Basalt	0.1	G	-	"	✓	-	-	✓	-	With thin glass layer and sediment cones.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-19	Basalt	0.5	G	-	Scarce.	✓				-	Glassy, 13 pieces weighing between TR-0.1 Kg each
11-20	Basalt	0.3	F	-	-	✓				-	More vesicular.
11-21	Basalt	0.1	F	-	-	✓				-	" "
11-22	Basalt	0.2	G	-	-					-	A number of pieces, weight between TR-0.02 Kg each.
11-23	Carbonate Sed.	0.1	-	-	-					Hard, consolidated.	2 pieces.
11-24	Ooze	0.1	-	-	-					Consolidated.	Softer than 11-23.
11-25	Basalt	6.8	G	-	-					-	Glassy surface, some consolidated ooze.
11-26	Basalt	1.3	G	-	Scarce.	✓				-	Column shaped.
11-27	Basalt	1.4	G	-	"	✓				-	" "
11-28	Basalt	1.3	F	-	-					-	-
11-29	Basalt	1.8	F	-	-					-	-
11-30	Basalt	1.4	F	-	-					-	-
11-31	Basalt	1.4	F	-	-					-	-
11-32	Basalt	>9.0	G	-	Scarce.	✓				-	Pillow structure with glassy rind.
11-33	Basalt	"	G	-	"	✓				-	Same as 11-32. Slightly more vesicles than 11-32.
11-34	Basalt	9.1	G	-	"	✓				-	Pillow structure w/glassy rind. Some consolidated ooze.
11-35	Basalt	"	"	-	"	✓				-	" " " "
11-36	Basalt	>9.0	F	-	Abundant Ol.					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-37	Basalt	7.7	G	-	Large Ol.	✓	—	—	—	-	Glassy.
11-38	Basalt	6.8	G	-	" "	✓	—	—	—	-	Glassy.
11-39	Basalt	6.8	G	-	Scarce.	✓	—	—	—	-	Pillow structure with glassy rind.
11-40	Basalt	6.8	F	-	Few.	✓	—	—	—	-	-
11-41	Basalt	2.3	G	-	Few.	✓	—	—	—	-	With glass.
11-42	Basalt	0.9	G	-	Few.	✓	—	—	—	-	" "
11-43	Basalt	2.3	G	-	Few.	✓	—	—	—	-	" "
11-44	Basalt	1.4	G	-	Few.	✓	—	—	—	-	" "
11-45	Basalt	1.3	G	-	Few.	✓	—	—	—	-	" "
11-46	Basalt	1.8	G	-	Few.	✓	—	—	—	-	" "
11-47	Basalt	0.9	G	-	Few.	✓	—	—	—	-	" "
11-48	Basalt	0.9	G	-	Few.	✓	—	—	—	-	" "
11-49	Basalt	0.7	G	-	Few.	✓	—	—	—	-	" "
11-50	Basalt	0.5	G	-	Few.	✓	—	—	—	-	" "
11-51	Basalt	0.5	G	-	Few.	✓	—	—	—	-	" "
11-52	Basalt	0.5	G	-	Few.	✓	—	—	—	-	" "
11-53	Basalt	0.5	G	-	Few.	✓	—	—	—	-	" "
11-54	Basalt	0.3	G	-	Few.	✓	—	—	—	-	" "

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-55	Basalt	0.3	G	-	Few.	✓	—	—	—	-	With glass.
11-56	Basalt	0.2	G	-	Few.	✓	—	—	—	-	" "
11-57	Basalt	0.2	G	-	Few.	✓	—	—	—	-	" "
11-58	Basalt	0.2	G	-	Few.	✓	—	—	—	-	" "
11-59	Basalt	1.3	G	-	Large.	✓	—	—	—	-	Glassy.
11-60	Basalt	0.9	G	-	Large.	✓	—	—	—	-	Glassy, fewer vesicles.
11-61	Basalt	0.5	G	-	Large.	✓	—	—	—	-	" " "
11-62	Basalt	0.2	G	-	Large.	✓	—	—	—	-	" " "
11-63	Basalt	0.3	F	-	-	✓	—	—	—	-	-
11-64	Basalt	0.5	F	-	Scarce.	✓	—	—	—	-	Glass scarce, vesciles occur in a layered fashion.
11-65	Basalt	0.5	G	-	Few.	✓	—	—	—	-	No glass.
11-66	Basalt	0.5	G	-	Few.	✓	—	—	—	-	No glass, 3 pieces total.
11-67	Basalt	0.9	G	-	Few.	✓	—	—	—	-	-
11-68	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-69	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-70	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-71	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-72	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-73	Basalt	0.9	G	-	Few.	✓	—	—	—	-	-
11-74	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-75	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-76	Basalt	0.5	G	-	Few.	✓	—	—	—	-	-
11-77	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-78	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-79	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-80	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-81	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-82	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-83	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-84	Basalt	0.2	G	-	Few.	✓	—	—	—	-	-
11-85	Basalt	0.2	G	-	Few.	✓	—	—	—	-	-
11-86	Basalt	0.2	G	-	Few.	✓	—	—	—	-	-
11-87	Basalt	0.2	G	-	Few.	✓	—	—	—	-	-
11-88	Basalt	0.2	G	-	Few.	✓	—	—	—	-	-
11-89	Basalt(?)	0.5	-	-	-	—	—	—	—	-	A number of small pieces weighing between TR-0.2kg.
11-90	Basalt	0.9	G	-	Large Ol.	—	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 11, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-91	Basalt	0.3	G	-	Large Ol.	—	—	—	—	-	No glass.
11-92	Basalt	0.3	G	-	Large Ol.	—	—	—	—	-	No glass.
11-93	Basalt	0.2	G	-	Large Ol.	—	—	—	—	-	No glass.
11-94	Basalt	0.2	G	-	Large Ol.	—	—	—	—	-	No glass.
11-95	Basalt	0.1	G	-	Large Ol.	—	—	—	—	-	No glass.
11-96	Basalt	TR	G	-	Large Ol.	—	—	—	—	-	No glass.
11-97	Basalt	0.9	G	-	Few.	✔	—	—	—	-	No glass.
11-98	Basalt	0.9	G	-	Few.	✔	—	—	—	-	No glass.
11-99	Basalt	0.5	G	-	Few.	✔	—	—	—	-	No glass.
11-100	Basalt	0.5	G	-	Few.	✔	—	—	—	-	No glass, a number of smaller pieces between TR-0.2kg
11-101	Volcanic Glass	0.1	G	-	-	—	—	—	✔	-	-
11-102	Basalt	1.3	G	-	Few.	✔	—	—	—	-	-
11-103	Basalt	1.1	G	-	Few.	✔	—	—	—	-	-
11-104	Basalt	0.9	G	-	Few.	✔	—	—	—	-	With slightly more vesicles.
11-105	Basalt	0.8	G	-	Few.	✔	—	—	—	-	With thin layer consolidated ooze on surface.
11-106	Basalt	0.7	G	-	Few.	✔	—	—	—	-	-
11-107	Basalt	0.7	G	-	Few.	✔	—	—	—	-	-
11-108	Basalt	0.7	G	-	Few.	✔	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-109	Basalt	0.6	G	-	Few.	✓	—	—	—	-	-
11-110	Basalt	0.8	G	-	Large in size.	✓	—	—	—	-	-
11-111	Basalt	0.6	G	-	Large in size.	✓	—	—	—	-	Slightly more vesicles and these are sediment filled.
11-112	Basalt	0.9	G	-	Few.	✓	—	—	—	-	With thin layer of consolidated ooze on surface.
11-113	Basalt	0.6	G	-	Few.	✓	—	—	—	-	-
11-114	Basalt	0.6	G	-	Few.	✓	—	—	—	-	With thin layer of consolidated ooze on surface.
11-115	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-116	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-117	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-118	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-119	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-120	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-121	Basalt	0.3	G	-	Few.	✓	—	—	—	-	With thin layer of consolidated ooze on surface.
11-122	Basalt	0.3	G	-	Few.	✓	—	—	—	-	" " "
11-123	Basalt	0.3	G	-	Few.	✓	—	—	—	-	With slightly more vesicles then 11-102.
11-124	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-125	Basalt	0.3	G	-	Few.	✓	—	—	—	-	-
11-126	Basalt	0.4	G	-	Few.	✓	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-127	Basalt	0.2	G	-	Few.	✓				-	-
11-128	Basalt	0.2	G	-	Few.	✓				-	With a thin layer of consolidated ooze on surface.
11-129	Basalt	0.2	G	-	Few.	✓				-	-
11-130	Basalt	0.2	G	-	Few.	✓				-	With a thin layer of consolidated ooze on surface.
11-131	Basalt	0.2	G	-	Few.	✓				-	" " "
11-132	Basalt	0.1	G	-	Few.	✓				-	-
11-133	Basalt	0.2	G	-	Few.	✓				-	With a thin layer of consolidated ooze on surface.
11-134	Basalt	0.2	G	-	Few.	✓				-	-
11-135	Basalt	0.1	G	-	Few.	✓				-	-
11-136	Basalt	0.1	G	-	Few.	✓				-	-
11-137	Basalt	0.1	G	-	Few.	✓				-	-
11-138	Basalt	0.2	G	-	Few.	✓				-	-
11-139	Basalt	0.1	G	-	Few.	✓				-	With thin layer of consolidated ooze on surface.
11-140	Basalt	0.2	G	-	Few.	✓				-	-
11-141	Basalt	0.1	G	-	Few.	✓				-	-
11-142	Basalt	0.1	G	-	Few.	✓				-	-
11-143	Basalt	0.1	G	-	Few.	✓				-	-
11-144	Basalt	0.1	G	-	Few.	✓				-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-145	Basalt	0.1	G	-	Few.	✓	—	—	—	-	-
11-146	Basalt	0.1	G	-	Some large phenocrysts.	✓	—	—	—	-	-
11-147	Basalt	0.1	G	-	Few.	✓	—	—	—	-	Glass is highly weathered.
11-148	Basalt	0.1	G	-	Few.	✓	—	—	—	-	-
11-149	Basalt	0.1	G	-	Few.	✓	—	—	—	-	With thin layer of consolidated ooze on surface.
11-150	Basalt	0.1	G	-	Few.	✓	—	—	—	-	" " "
11-151	Basalt	0.1	G	-	Few.	✓	—	—	—	-	" " "
11-152	Basalt	0.6	G	-	-	—	—	—	—	-	All Glass. A number of pebbles weighing between TR-0.1kg.
11-153	Basalt	1.2	F	-	Few.	✓	—	—	—	-	-
11-154	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-155	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-156	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-157	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-158	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-159	Basalt	0.4	F	-	Few.	✓	—	—	—	-	-
11-160	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-161	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-162	Basalt	0.5	F	-	Few.	✓	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-163	Basalt	0.5	F	-	Few.	✓	—	—	—	-	-
11-164	Basalt	0.2	F	-	Few.	✓	—	—	—	-	-
11-165	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-166	Basalt	0.2	F	-	Few.	✓	—	—	—	-	-
11-167	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-168	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-169	Basalt	0.2	F	-	Few.	✓	—	—	—	-	-
11-170	Basalt	0.2	F	-	Few.	✓	—	—	—	-	-
11-171	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-172	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-173	Basalt	0.3	F	-	Few.	✓	—	—	—	-	-
11-174	Basalt	1.5	F	-	Few.	✓	—	—	—	-	A number of rocks as 11-153 weighing between 0.1-0.2kg.
11-175	Basalt	1.8	F	-	Few.	✓	—	—	—	-	Fragments weighing between TR-0.1kg.
11-176	Basalt	0.3	G	-	Abundant Ol.	—	—	—	—	-	With glass.
11-177	Basalt	0.2	G	-	" "	—	—	—	—	-	With glass, two pieces.
11-178	Basalt	0.3	G	-	" "	—	—	—	—	-	No glass.
11-179	Basalt	0.2	G	-	" "	—	—	—	—	-	No glass.
11-180	Basalt	0.1	G	-	" "	—	—	—	—	-	No glass, banded.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 11 DREDGE 11 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
11-181	Basalt	0.2	F	-	-	✓	—	—	—	-	vesicular.
11-182	Basalt	0.5	G	-	-	—	—	—	—	Glass to palagonite.	Some consolidated ooze on surface.
11-183	Volcanic Glass	TR	G	-	-	—	—	—	VH	-	-
11-184	Erratics	0.1	-	1 schistose gneiss, 3 silicious.						-	4 erratics.
11-185	Coarse Ooze	1 jar	-	-	-	—	—	—	—	-	With small pebbles and shell fragments.
11-186	Mélange	0.2	-	Basalt and glass fragments in matrix of ooze and clay.							-
11-187	Basalt	2.3	G	-	-	—	—	—	VH	-	Consolidated ooze coating.
11-188	Ooze	0.2	-	-	-	—	—	—	—	Consolidated.	with few detritals, burrowed.
11-189	Ooze	0.2	-	-	-	—	—	—	—	Consolidated.	with few detritals, burrowed, note banding.
11-190	Ooze	0.1	-	-	-	—	—	—	—	Consolidated.	with few detritals, burrowed, some glass present.
11-191	Basalt	0.3	G	-	-	—	—	—	—	-	With glass, much consolidated ooze on surface.
11-192	Basalt	0.7	G	-	-	—	—	—	—	-	With glass, less ooze.
11-193	Basalt	0.5	G	-	-	—	—	—	—	-	With glass, less ooze.
11-194	Basalt	0.3	G	-	-	—	—	—	VH	-	Highly weathered glass.
11-195	Ooze	0.1	-	-	-	—	—	—	—	Consolidated.	with included fragments abundant.
11-196	Ooze	0.1	-	-	-	—	—	—	—	Consolidated.	included fragments, mostly glass and detritus.
11-197	Sediment	0.1	-	-	-	—	—	—	—	Consolidated.	Note bedding.
11-198	Coral Stem	0.2	-	-	-	—	—	—	—	-	Large, 2 cm diameter.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 12 DREDGE 12 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
12-1	Erratic	>9.0	-	Gneissic.	-	—	—	—	—	-	Boulder sized.
12-2	Basalt	1.1	G	-	Large Ol.	—	—	—	✓	-	Thin layer of glass.
12-3	Basalt	2.0	G	-	" "	—	—	—	✓	-	" " "
12-4	Basalt	1.1	G	-	" "	—	—	—	✓	-	" " "
12-5	Basalt	0.3	G	-	" "	—	—	—	✓	-	" " "
12-6	Basalt	0.9	G	-	" "	—	—	—	✓	-	Fresher glass and fewer phenocrysts than 12-2.
12-7	Basalt	0.5	G	-	Many large Ol.	—	—	—	✓	-	More phenocrysts than 12-6.
12-8	Basalt	0.3	G	-	Large Ol.	—	—	—	✓	-	Fresher glass and fewer phenocrysts than 12-2.
12-9	Basalt	0.1	F	-	-	✓	—	—	—	-	-
12-10	Coral	TR	-	-	-	—	—	—	—	-	Dead.
12-11	Erratic	TR	-	-	-	—	—	—	—	-	Pebble sized.
12-12	Ooze	0.1	-	-	-	—	—	—	—	Consolidated.	Free of detritals, burrowed.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 13 DREDGE 13 DESCRIBED BY Geoff Thompson DATE July 12, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
13-1	Biogenous Matter	1-1 gal. jar	—	-	-	—	—	—	—	-	Preserved in formalin.
13-2	Coarse Foram Ooze	1-1 gal. jar	—	-	-	—	—	—	—	-	With clay, shell and rock fragments.
13-3	Coral and shells	1.4	—	-	-	—	—	—	—	-	In fragments, dead.
13-4	Ooze	0.3	—	-	-	—	—	—	—	Consolidated.	with coral fragments.
13-5	Ooze	0.1	—	-	-	—	—	—		Consolidated.	very few detritals, two small pieces.
13-6	Basalt	0.1	F	-	-	—	—	—	VH	-	Very friable.
13-7	Erratics	0.1	—	-	-	—	—	—		-	Pebble sized.
13-8	Basalt	0.9	G	-	-	—	—		VH	-	Some glass, coral bases, and worm tubes.
13-9	Basalt	0.3	G	-	-	✓	—		VH	-	No glass, with vesicles.
13-10	Basalt	0.3	G	-	-	✓	—		VH	-	" " " "
13-11	Basalt	0.3	G	-	-	✓	—		VH	-	" " " "
13-12	Basalt	0.2	G	-	-	✓	—		VH	-	" " " "
13-13	Basalt	0.2	G	-	-	✓	—		VH	-	" " " "
13-14	Coral	1.8	—	-	-	—	—	—	—	-	Dead.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 14 DREDGE 14 DESCRIBED BY Geoff Thompson DATE July 13, 1984

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
14-1	Coarse Ooze	1-1 gal. jars	-	-	-					-	With clay, shell and rock fragments.
14-2	Ooze	1/3 jar	-	-	-					-	With clay, shells and pebbles.
14-3	Erratics	0.1	-	-	-					-	A number of small to very small pebbles.
14-4	Biogenous Matter	2 jars	-	-	-					-	Sponge and medusa preserved in formalin.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 15 DREDGE 15 DESCRIBED BY Geoff Thompson DATE July 13, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15-1	Coarse Ooze	1/3 jar	-	-	-	—	—	—	—	-	With clay, shell and rock fragments (basalt glass?).
15-2	Basalt Glass	TR	G	-	-	—	—	✔	-	-	-
15-3	Pebbles	TR	G	-	-	—	—	—	—	-	Basalt and basalt glass.
15-4	Erratics	TR	-	-	-	—	—	—	—	-	Pebble sized.

WHOI ROCK SAMPLE DESCRIPTION

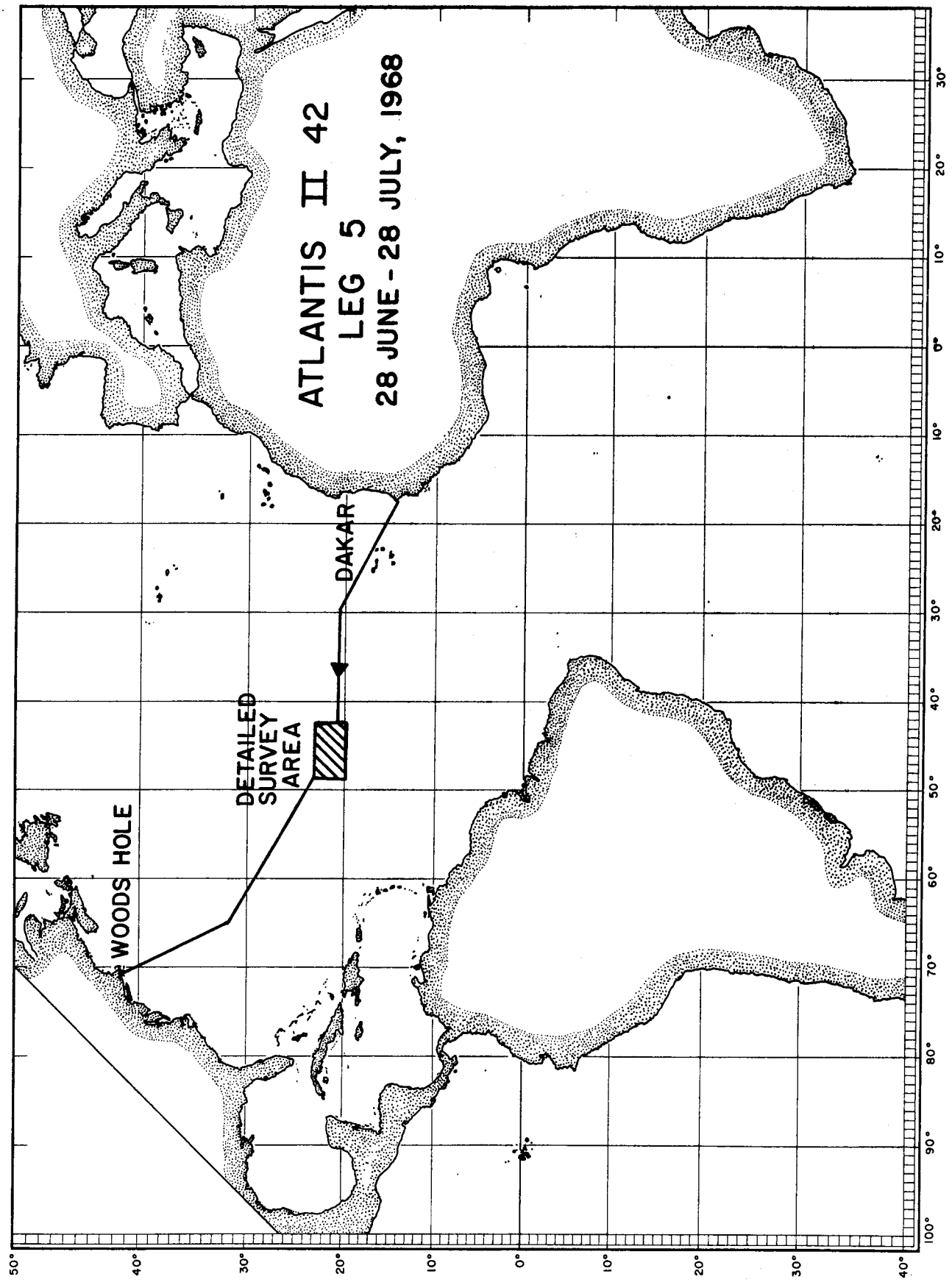
CRUISE AII 32 STATION 16 DREDGE 16 DESCRIBED BY Geoff Thompson DATE July 14, 1967

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
16-1	Coarse Ooze	2 jars	-	-	-					-	With clay, shell and rock fragments.
16-2	Coarse Ooze	1 jar	-	-	-					-	With a few rock fragments.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 32 STATION 17 DREDGE 17 DESCRIBED BY Geoff Thompson DATE July 14, 1967

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
17-1	Coarse Ooze	1½-1 gal. jars	-	-	-					-	With clay shell and rock fragments.
17-2	Erratic	-	-	-	-					-	One small pebble.


ATLANTIS II 42
LEG 5
28 JUNE - 28 JULY, 1968
WOODS HOLE
DETAILED SURVEY AREA
DAKAR
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100°

********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	42	1	0018	0000	8	68 713	19 27.8'N	46 5.6'W	3	41.96	0001	2861.	2861.	010K	16	0000	0	
AII	42	1	0019	0000	8	68 713	19 32.3'N	46 6.1'W	1	41.96	0002	2278.	2278.	7.5K	16	0000	0	
AII	42	5	0001	0000	8	68 610	4 8.0'S	12 7.0'W	1	301.42	0001	3061.	2871.	134K	19	0000	0	
AII	42	5	0002	0000	8	68 611	3 49.0'S	11 3.0'W	1	301.31	0002	3468.	3231.	059K	19	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 42 STATION 1 DREDGE 1 DESCRIBED BY Geoff Thompson DATE June 10, 1968

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1-1	Foram Sand	1 can	-	-	-					-	Coarse with some rocks.
1-2	Foram Sand	3 jars	-	-	-					-	Many small rock fragments.
1-3	Pillow Basalt	14	A	-	Chilled margins.			TR	-	Extensively alt. to greenstone.	Also large areas of chlorite alteration.
1-4	Pillow Basalt	20	A	-	-			TR	-	Extensive greenstone with abundant chlorite.	Glassy margins.
1-5	Pillow Basalt	6.5	A	-	-			.5 cm	-	Some interiors alt. to greenstone.	-
1-6	Basalt	2	A	-	-			.5	-	Slight interior greenstone.	-
1-7 to 1-35	Pillow Basalt	many pcs.	A	-	-			.2-.5	-	Slight greenstone alteration.	Very many small to 1-1/2 Kg sized fragments w/chill margins
1-38 to 1-56	Pillow Basalt	many pcs.	A	-	-			TR	-	Slight greenstone alteration.	Many small fragments w/chilled glassy margins.
1-57 to 1-82	Pillow Basalt	many pcs.	A	-	-			TR	-	" "	No chilled or glassy margins
1-83 to 1-94	Basalt	many pcs.	A	-	-			TR	-	" "	Greasy green gray luster.
1-95	Metabasalt	1	-	-	-			TR	-	Zone of intense shearing on one surface.	Chlorite rich zone.
1-96 to 1-98	Metabasalt	3 pcs.	F	-	-					" "	" " "
1-99 to 1-101	Pillow Basalt	3 pcs.	-	-	-					Badly sheared and chloritized.	Upper surface, total 5 Kg.
1-102 to 1-105	Pillow Basalt	4 pcs.	-	-	-					Intensely chloritized upper surface.	-
1-106 to 1-112	Metabasalt	7 pcs.	-	-	-					Intensely chloritized.	Numerous small pieces.
1-113	Metabasalt	.1	-	-	-					Crystalline calcite on surface.	-
1-114	Metatuff(?)	.1	-	-	-					Highly chloritized upper surface.	-
1-122 to 1-126	Metabasalt	5 pcs.	-	-	-			.5	-	Heavily crusted.	Many small pieces.

WHOI ROCK SAMPLE DESCRIPTION

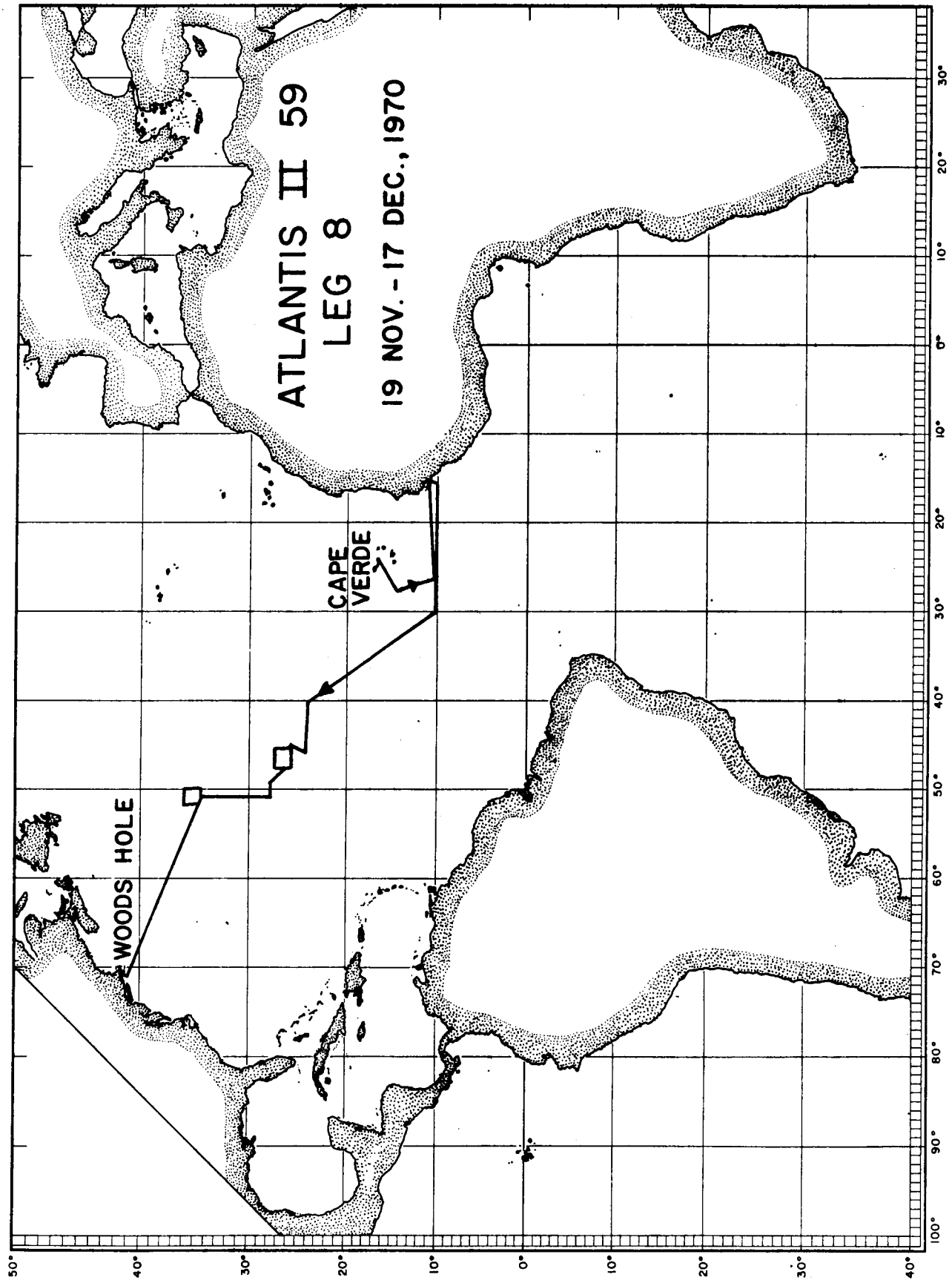
CRUISE AII 42 STATION 1 DREDGE 1 DESCRIBED BY Geoff Thompson DATE June 10, 1968

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1-129	Metabasalt	.7	F	-	-	—	—	—	—	Partially chloritized.	-
1-130 to 1-165	Metabasalt	many pcs.	F	-	-	—	—	—	—	Varying degrees of chloritization.	Numerous small cobbles.
1-166	Metabasalt	.2	F	-	-	—	—	TR	-	Chloritized surface.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 42 STATION 2 DREDGE 2 DESCRIBED BY Geoff Thompson DATE June 10, 1968

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2-1	Foram Sand	.05	-	-	-	—	—	—	—	-	Stored in jars.
2-3	Peridotite	22	M	-	-	—	—	.5 overall	-	Highly alt., serpentinized.	Small sponges on surface.
2-4	Peridotite	15	M	-	-	—	—	.3 one	M	Altered interior.	Serpentinized surface.
2-5	Peridotite Breccia	10	-	-	-	—	—	.5 one	H	-	Broken up with surpentine debris embedded.
2-6	Peridotite	.7	-	-	-	—	—	—	M	Partial serpent. qtz.rich areas.	Marked alteration.
2-7	Peridotite	.7	-	-	-	—	—	—	M-H	-	Similar to 2-6 but more intense alteration.
2-8	Peridotite	1.2	-	-	-	—	—	—	H	Intense weathering.	-
2-9 to 2-21	Peridotite	many pcs.	-	-	-	—	—	—	H	" "	Partial serpentinization, many small pieces.
2-22	Peridotite Breccia	.6	-	-	-	—	—	—	M	-	Cemented with serpentine debris.
2-23	Peridotite Breccia	.4	-	-	-	—	—	—	—	-	Highly weathered serpentine cement.
2-24 to 2-26	Peridotite	many pcs.	-	-	-	—	—	—	—	Serpentinized surface.	3 pieces similar to 2-8.
2-27 to 2-29	Serpentinite	3 pcs.	-	-	-	—	—	—	H	-	Small cobbles.


ATLANTIS II 59
LEG 8
19 NOV. - 17 DEC., 1970
WOODS HOLE
CAPE VERDE
50°
40°
30°
20°
10°
0°
10°
20°
30°
40°
50°
60°
70°
80°
90°
100°

********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **wHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	59	8	0003	0000	8	7012 4	26 59.0'N	42 40.0'W	1	77.62	0003	3500.	3390.	018K	16	0000	0	
AII	59	8	0004	0000	8	7012 4	27 10.0'N	43 28.0'W	1	77.73	0004	3235.	2910.	002K	16	0000	0	
AII	59	8	0005	0000	8	7012 4	27 12.0'N	43 36.0'W	1	77.73	0005	3670.	2885.	150K	16	0000	0	
AII	59	8	0006	0000	8	7012 5	27 15.0'N	43 49.0'W	1	77.73	0006	2980.	2530.	004K	16	0000	0	
AII	59	8	0007	0000	8	7012 5	27 14.0'N	43 58.0'W	1	77.73	0007	2785.	2140.	012K	16	0000	0	
AII	59	8	0010	0000	8	7012 7	27 18.0'N	44 22.0'W	1	77.74	0010	2860.	2255.	001K	16	0000	0	
AII	59	8	0011	0000	8	7012 7	27 29.0'N	44 44.0'W	1	77.74	0011	2745.	2535.	500G	16	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 59 STATION 3 DREDGE 3 DESCRIBED BY Geoff Thompson DATE Dec. 4, 1970

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
3-1	Fe-Mn Crust	.4	-	-	-					Possible palagonite on lower surface.	12 x 7 x 4 cm
3-2	Fe-Mn Crust	.25	-	-	-					Thin palagonite on underside.	-
3-3 to 3-15	Fe-Mn Crust	.5	-	-	-					-	Many small pieces of Fe-Mn crusts.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 59 STATION 4 DREDGE 4 DESCRIBED BY Geoff Thompson DATE Dec. 4, 1970

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
4-1	Foram Ooze	3	-	-	-					50% clay plus a few pteropods.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 59 STATION 5 DREDGE 5 DESCRIBED BY Geoff Thompson DATE Dec. 4, 1970

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
5-2	Basalt	5	A	-	Small plag. welded thru-out.	—		1/2 cm	M	Welded basalt breccia,one surface.	Crust on one side only.
5-3	Basalt Breccia	6	C	-	-	—		.5 cm	M	-	Glassy surface is weathered.
5-4	Basalt Breccia	5	C	-	-	—				-	Weathered glass throughout.
5-5	Basalt	5	A	-	-	—		.25	-	-	Mn on one surface only.
5-6 to 5-7	Basalt	2.5 ea.	A	-	-	—		TR	-	-	Angular block.
5-8 to 5-13	Basalt	-	A	-	-	—		.1-.25	-	Mn on upper surface only.	Numerous small blocks.
5-14	Basalt	10	A	-	-	—		TR	-	-	Glassy upper surface.
5-15 to 5-16	Basalt	10.5 ea.	A	-	-	—		.2	-	Mn on upper.	Sub-angular block.
5-17	Basalt	3	A	-	-	—		.2	-	Mn on all surfaces.	Sub-angular block.
5-23	Basalt	11	A	-	-	—		.1	L	Mn on upper surfaces only.	Boulder-possibly breccia.
5-24	Basalt	3	A	-	-	—		.1	-	Mn on upper surfaces only.	Sub-angular block.
5-25	Basalt Breccia	.7	C	-	-	—		.2	-	Mn on all surfaces.	-
5-27 5-28	Basalt Breccia	1	C	-	-	—				Possible chloritization.	Two pieces.
5-29 to 5-38	Basalt	-	A	-	-	—		.1	-	Mn on all surfaces.	Many small cobbles.
5-39	Basalt	7.5	A	-	-	—				-	Angular fragment.
5-40	Basalt Breccia	5	C	-	-	—		.2	-	FeMn crust on surfaces.	Much glass.
5-41 to 5-46	Basalt	-	A	-	-	—				-	Glassy surfaces on many small pieces.
5-52	Basalt	7	A	-	-	—		.1	-	Mn on upper surface.	Subangular block.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 59 STATION 5 DREDGE 5 DESCRIBED BY Geoff Thompson DATE Dec. 4, 1970

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
5-54	Basalt	1	A	-	-	—		.1	-	Weathered glass.	Mn on all surfaces.
5-55 to 5-59	Basalt	1	A	-	-	—		.1	-	-	FeMn on upper surfaces.
5-60, 5-61	Basalt	-	-	-	-	—		—	—	FeMn on surface.	Subangular cobbles.
5-64	Basalt	3	A	-	-	—		—	—		Numerous small cobbles.
5-66	Basalt	10	A	-	-	—		—	—	-	Many small pieces of basalt, no glass or Mn.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 59 STATION 6 DREDGE 6 DESCRIBED BY Geoff Thompson DATE Dec. 5, 1970

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
6-1	Calc Ooze	5	-	-	-					Clay and pteropods.	-

WHOI ROCK SAMPLE DESCRIPTION

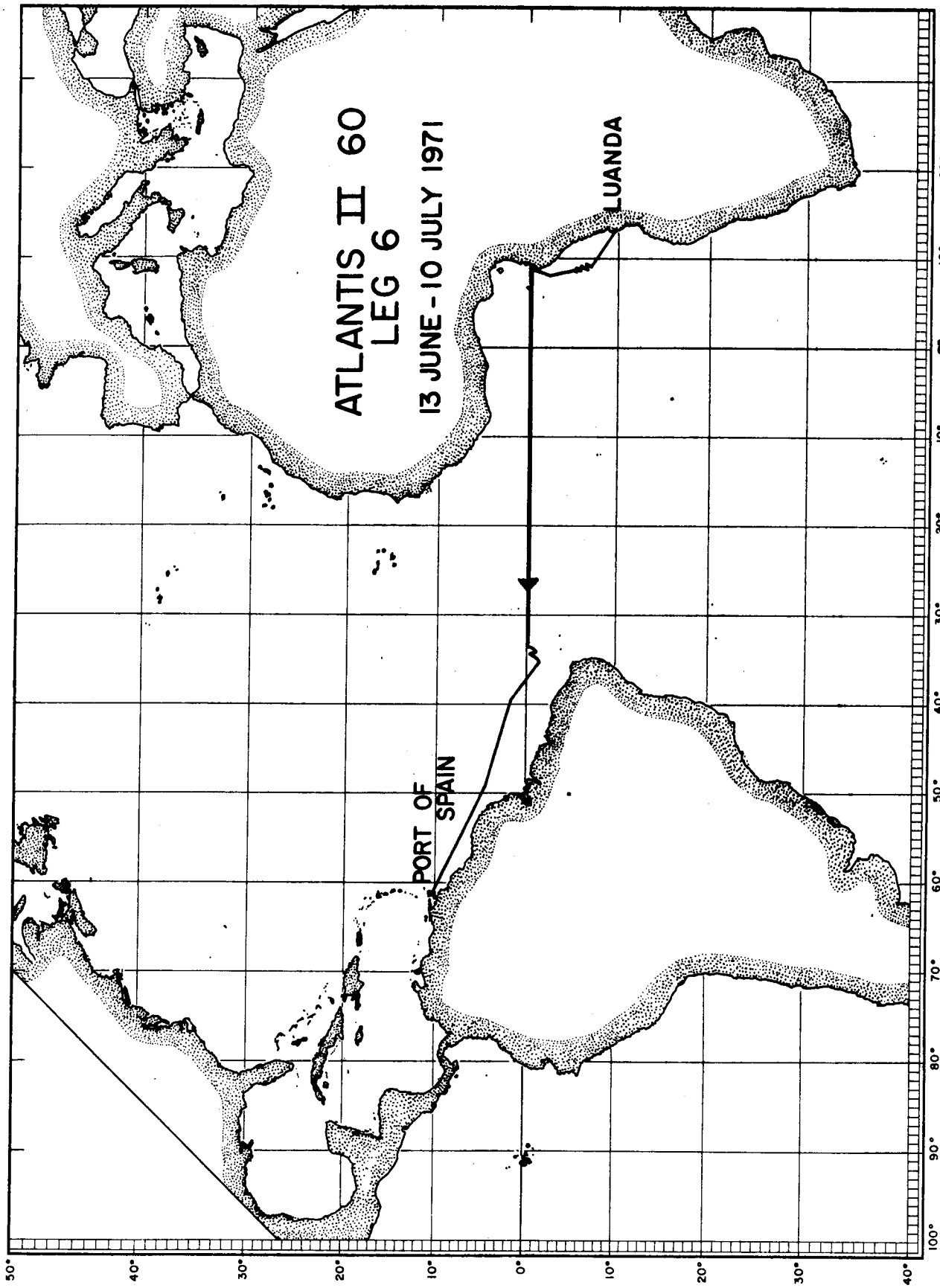
CRUISE AII 59 STATION 7 DREDGE 7 DESCRIBED BY Geoff Thompson DATE Dec. 5, 1970

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
7-1	Basalt	5	A	-	-	—		Thin all over	-	-	Glass on upper surface.
7-2	Basalt	4	A	-	-	—		—	—	Thin crust of glass.	Sub-angular block.
7-3	Basalt	1	A	-	-	—		1 cm	-	Mn on one surface only.	Sub-rounded.
7-4	Basalt	1	A	-	-	—		"	-	Mn all over.	Sub-rounded.
7-5	Basalt Breccia	.5	C	-	-	—		1/2 cm	-	-	Mn on upper surface.
7-6	Calc Ooze	.1	-	-	-	—		—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 59 STATION 10 DREDGE 10 DESCRIBED BY Geoff Thompson DATE 7 Dec. 1970

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
10-2	Basalt	.1	A	-	-	——		.25		-	Mn coated cobble.
10-3 to 10-5	Basalt	-	A	-	-	——		.25		-	Several Mn coated cobbles
10-7	Coral	.05	-	-	-	——	——	——	——	-	Mn coated horn.
10-8	Branching Coral	.1	-	-	-	——	——	——	——	-	FeMn coated.


ATLANTIS II 60
LEG 6
13 JUNE - 10 JULY 1971
LUANDA
PORT OF SPAIN
50°
40°
30°
20°
10°
0°
10°
20°
30°
40°
100°
90°
80°
70°
60°
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40°
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20°
30°

********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	60	6	0014	0000	8	71 624	0 5.0'N	18 17.0'W	9	2.08	0014	2800.	2519.	500G	19	0000	0	
AII	60	6	0015	0000	8	71 624	0 4.0'S	18 18.0'W	9	301.08	0015	4512.	3500.	128K	19	0000	0	
AII	60	6	0017	0000	8	71 624	0 9.0'S	18 22.0'W	9	301.08	0017	6387.	5675.	180K	19	0000	0	
AII	60	6	0018	0000	8	71 625	0 9.0'N	17 17.0'W	9	2.07	0018	5675.	5186.	500G	19	0000	0	
AII	60	6	0019	0000	8	71 626	0 9.0'N	17 19.0'W	9	2.07	0019	5960.	5186.	023K	19	0000	0	
AII	60	6	0020	0000	8	71 626	0 13.0'N	17 18.0'W	9	2.07	0020	3996.	3558.	500G	19	0000	0	
AII	60	6	0021	0000	8	71 626	0 24.0'N	17 20.0'W	9	2.07	0021	2237.	1714.	045K	19	0000	0	
AII	60	6	0022	0000	8	71 627	0 18.0'N	17 2.0'W	9	2.07	0022	4243.	2034.	002K	19	0000	0	
AII	60	6	0023	0000	8	71 627	0 19.0'N	17 8.0'W	9	2.07	0023	4417.	3938.	250G	19	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 2 DREDGE 2 DESCRIBED BY Geoff Thompson DATE 23 May 1971

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2-1	Rock fragments	1 Pt.	C	-	-					-	Pint jar, coarse foram sand and rock gravel.
2-2	Metabasalt	14	-	-	-			1-2	L	-	Thin Mn crust - large flat slab.
2-3	Basalt	6	-	-	Pg & Ol crystals.			TR	M	-	Inner fresh zone, outer weathered. (Fresh core, weathered rim.)
2-4	Metabasalt	4.5	-	-	-			1-2	L	-	Flat slab, thin Mn crust.
2-5	Pillow basalt	9	A	-	-			TR	L	TR-palagonite.	Glassy margin.
2-6	Pillow basalt	9	A	-	Pg - some.			TR	L	"	Glassy margin.
2-7	Basalt	8	-	-	Pg - few crystals.			TR	-	-	Glassy basalt.
2-8	Basalt	1.2	-	-	-			TR	-	-	No glass, cobble size
2-9	Basalt	1.7	-	-	-					-	Glassy margin, large fragment.
2-10	Basalt	1	-	-	Pg - large crystals(up to 1cm).					-	-
2-11	Basalt	1	-	-	Pg - Large crystals.					-	-
2-12	Basalt	.4	-	-	Trace of phenocrysts.					-	Glassy margin.
2-13	Basalt	.4	F	-	-					Slightly altered interior.	-
2-14	(Meta) Basalt	.2	F	-	-					Metamorphic alteration.	-
2-15	Meta Basalt	.2	F	-	-	X	X			-	Vesicles have crystal lining (zeolites?).
2-16	Gabbro	.4	C	-	-					Extensive recrystallization.	-
2-17	Gabbro	.5	C	-	-					Ext. recrystalli- zation.	Very coarse.
2-18	Basalt	.5	-	-	Pg large phenocrysts.					-	Glassy margin noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 2 DREDGE 2 DESCRIBED BY G. Thompson DATE 23 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2-19	Pillow basalt	3.0	A	-	-			1-2	M	Mn + palagonite crust.	Pillow fragments, glassy margin.
2-20	Pillow basalt	3.5	A	-	-			1-2	M	Mn + palagonite crust.	Little glass.
2-21	Pillow basalt	2.0	A	-	-			1-2	M	Mn + palagonite crust.	Glassy margin.
2-22	Pillow basalt	7.0	A	-	-			1-2	M	Mn + palagonite crust.	Glassy margin.
2-(23-36)	Basalt	~7.5 tot.	-	-	-			TR	L	-	Numerous small rocks, glassy margins.
2-(37-38)	Glass	0.2 tot.	G	-	-					-	Glass fragments.
2-39	Basalt	1.7	-	-	-				L	-	Glassy margin.
2-(40-60)	Basalt	-	-	-	Traces.			TR	L	-	Numerous small rocks.
2-61	Basalt	0.4	-	-	-					-	Glassy margin; fragments.
2-62	Basalt	5.0	-	-	Traces.			TR	L	-	Numerous small fragments.
2-63	Basalt	2.0	-	-	Traces.				L	-	Numerous small fragments, glassy margins.
2-64	Basalt	0.9	-	-	-					Signs of metamorphism.	Basalt fragments.
2-65	Metabasalt	0.6	C	-	-					-	Few fragments.
2-66	Amphibolite	0.05	-	-	-					-	One large crystal.
2-67	Metabasalt	0.05	-	-	Well developed crystals.					-	-
2-68	Metabasalt	0.1	-	-	Aragonite crystals on surface.					-	-
2-69	Metabasalt	0.05	-	-	Well developed crystals.			TR	-	-	Mn staining.
2-70	Basalt	3.0	-	-	Very few phenocrysts.	TR				-	Traces of vesicles, glassy margin.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 2 DREDGE 2 DESCRIBED BY Geoff Thompson DATE 23 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2-71	Basalt	1.2	-	-	Very few phenocrysts.	TR				-	Vesicles, glassy margins.
2-72	Basalt	1.0	-	-	Pg-large.					-	Glassy margins.
2-(73-87)	Basalt	14.2 tot.	-	-	-			TR		-	Glassy margins - numerous small rocks.
2-88	Basalt	0.6	-	-	Pg-large.					-	Glassy margins.
2-(89-99)	Basalt	2.5 tot.	-	-	-			TR	M	Glass to palagonite.	Numerous small rocks - glassy margins.
2-100	Basalt	0.6	-	-	Pg - Large phenocrysts.					-	Glassy margins.
2-101	Basalt	0.6	-	-	-			TR	L	-	Very little glass.
2-(102-140)	Basalt	-	-	-	Traces.			TR	-	-	Numerous small rocks.
2-141	Basalt	1.2	-	-	-			TR	M	Outer rim chloritized and metamorphised.	-
2-142	Basalt	1.1	-	-	-			TR	M	Outer rim chloritized and metamorphised.	Transition more advanced than 2-141.
2-143	Metabasalt	0.4	-	-	-					Early stage of metamorphism.	-
2-144	Assorted rocks	17	-	-	-					-	
2-145	Metabasalt	0.6	F	-	Large phenocrysts.					-	-
2-146	Metabasalt	0.4	-	-	-				H	Outer rim chloritized, small central protion remaining.	-
2-147	Metabasalt	0.4	C	-	-					-	-
2-148	Basalt	0.2	M	-	-					-	-
2-149	Metabasalt	0.2	C	-	-					-	-
2-(150-158)	Metabasalt	2.5	-	-	-			TR	-	-	Numerous small rocks.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 3 DREDGE 3 DESCRIBED BY Geoff Thompson DATE 24 May 1971

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
3-1	Rock Fragments	1 pt.	-	-	-					-	From cheesecloth in pipe dredge.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 4 DREDGE 4 DESCRIBED BY Geoff Thompson DATE 24 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
4-1	Sand/rock fragments		-	-	-					-	Intermixed in foram sand and mud.
4-2	Basalt	15	-	-	-			1-2	M	Mn+Fe/palagonite crust.	Glassy margin.
4-3	Basalt	2	-	-	Large phenocryst			1-2	M	Mn+Fe/palagonite crust.	Glassy margin. 3 samples total.
4-(4-6)	Basalt	2.3 tot.	-	-	-			1-2	M	Mn+Fe/palagonite crust.	Glassy margin.
4-7	Mn-Crust	10	-	-	-			2-3	-	Fe,Mn crust w/palagonite.	Friable and botryoidal surface.
4-(8-34)	Mn-Crust	-	-	-	-			2-3	-	Fe,Mn crust w/ palagonite.	Friable + botryoidal surface, numerous small rocks.
4-(35-40)	Foram Ooze	4.3 tot.	-	-	-			TR	-	Mn strained burrows.	Lithified carbonate, foram ooze, numerous small samples

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 5 DREDGE 5 DESCRIBED BY Geoff Thompson DATE 25 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
5-1	Foram ooze	2 gal.	-	-	-					-	Many rock fragments and mineral grains.
5-2	Foram ooze	1/3 gal.	-	-	-					-	Many rock fragments + mineral grains from pipe dredge
5-3	White clay	1/3 pt.	-	-	-					-	From main dredge.
5-4	Metabasalt	9	F	-	-					-	Large boulder, grayish green in color.
5-5	Gabbro ?	7	C	-	-				M	Chlorite.	Gabbroic texture.
5-(6-8)	Gabbro ?	10.2 tot.	C	-	Feldspar rich, white crystals on outer surface				M	Chlorite.	3 samples total. Gabbroic texture.
5-9	Gabbro	1.2	C	-	Altered Ol.				M	Chlorite.	Gabbroic texture.
5-10	Metabasalt	1.1	-	-	Feldspar-rich.					-	-
5-11	Basalt	1.2	-	-	Pg-phenocrysts.				L	Some alteration noted.	-
5-12	Basalt	1.1	-	-	-				M	Some alteration noted.	-
5-13	Massive serpentine/chlorite	0.5	-	-	-					Serpentinized and chloritized. (Alteration end product?).	
5-14	Gabbro	0.6	C	-	Chlorite altered Ol.				M	Serpentinized on outer surface.	-
5-(15-21)	Basalt	6.8 tot.	-	-	Pg-phenocrysts.				L	-	Numerous small rocks.
5-(22-37)	Metabasalt	6.0 tot.	-	-	Feldspar-rich.					-	16 samples total.
5-38	Gabbro	1.2	C	-	Altered Ol.				M	Chlorite.	Gabbroic texture.
5-(39-55)	Gabbro	7.3 tot.	C	-	Feldspar rich, white crystals on outer surface.				M	Chlorite.	17 samples total.
5-56	Metabasalt	0.3	C	-	-				M	Serpentine veins.	-
5-(57-58)	Massive serpentine/chlorite	1.0 tot.	-	-	-					Serpentinized + chloritized.	(Alteration end product?).

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 5 DREDGE 5 DESCRIBED BY Geoff Thompson DATE 25 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
5-59	Assorted rocks	1.2	-	-	-				L	Some alteration.	Small basalt samples.
5-60	Gabbro	0.4	C	-	Altered Ol.				M	Chlorite.	Gabbroic texture.
5-(61-62)	Gabbro	0.9 tot.	C	-	Feldspar rich.				M	"	Small rocks, slight banding
5-63	Basalt	0.3 tot.	F	-	-				M	Serpentinized surface.	Slickensides noted.
5-(64-80)	(Meta) Basalt	26 tot.	F	-	-				L	-	Assorted weights of rocks.
5-(81-108)	Gabbro	-	C	-	Feldspar rich, white crystals on outer surface.				M	Chlorite.	-
5-109	Small Rocks	9.0	-	-	-					-	Gravel-like, non-sorted.
5-(110-112)	Small rocks	7.3 tot.	-	-	-					-	Numerous rocks
5-113	Small rocks	1.0	-	-	Feldspar abundant white crystals.					-	-
5-115	Metabasalt	0.5	F	-	-					Early stages of metamorphism.	Grayish green.
5-116	Metabasalt	1.0	C	-	-				M	Serpentine.	Dark colored.
5-117	Gabbro	0.6	C	-	Feldspar rich, white crystals on outer surface.				M	Chlorite.	Light colored.
5-(118-130)	Metabasalt	12.2 tot.	F	-	-					Early stages of metamorphism.	Numerous small rocks.
5-131	Small rocks	2.0	-	-	-					-	-
5-(132-148)	Gabbro	19.2 tot.	C	-	Feldspar rich w/ white crystals.				M	Chlorite.	Numerous rocks.
5-149	Metabasalt	0.6	C	-	-				M	Serpentine.	Light colored vein.
5-(150-153)	Gabbro	19.2 tot.	C	-	Feldspar rich w/ white crystals.				M	Chlorite.	Numerous rocks, slickensides noted.
5-154	Metabasalt	4.0	C	-	-				M	Serpentine.	Dark colored.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-60 STATION 5 DREDGE 5 DESCRIBED BY Geoff Thompson DATE 25 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
5-(155-156)	Gabbro	114 tot.	C	-	Feldspar rich.	—	—	—	M	Chlorite.	Assorted rocks.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 9 DREDGE 9 DESCRIBED BY Thompson DATE 26 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9-1	Serpentine Fragments	1 pt.	-	-	-					-	In mud.
9-2	Serpentinite	22	-	-	-					-	Large boulder size.
9-3	Boulder	7	-	-	Rich in serpentine.					-	Dark colored.
9-4	Boulder	4	-	-	Serpentine Very crystalline.					-	Light colored.
9-5	Boulder	6	-	-	Serpentine Very crystalline.				M	Altered outer surface.	-
9-6	Boulder	4	-	-	Serpentine Very crystalline.				M	More altered outer surface.	-
9-(7-8)	Serpentinite	7 tot.	-	-	-					Serpentine well developed on slickenside surface.	Large block.
9-9	Boulder	7	-	-	Serpentine Very crystalline.					-	Light colored.
9-10	Boulder	5	-	-	Serpentine rich.					-	Dark colored.
9-11	Pillow Basalt	5	A	-	-					-	Rounded pillow fragments Fresh glass noted.
9-(12-13)	Fragments	13.7 tot.	-	-	-				M		Large blocky fragments with glass.
9-14	Fragments	8	-	-	-				M	Palagonitized glass.	Large blocky fragments with glass.
9-15	Pillow Basalt	9	A	-	-				M	Weathered spots on surface.	No glass.
9-16	Pillow Basalt	8	A	-	-	TR			M	-	1 vesicle - 10 cm, some glass.
9-17	Pillow Basalt	6	A	-	-					-	Rounded pillow fragments. Some fresh glass.
9-(18-19)	Fragments	16.4 tot.	-	-	-				M	Palagonitized glass.	Large rock fragments with glass.
9-20	Basalt	2	-	-	Olivine phenocrysts abundant.					-	Glass margins.
9-21	Metabasalt	-	-	-	-				H	-	Notable weathering.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 9 DREDGE 9 DESCRIBED BY Thompson DATE 26 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9-(22-26)	Pillow Basalt Fragments	8.2-total	A	-	-				L	Palagonitized.	Large blocky fragments, glassy. (5 samples total)
9-(27-28)	Pillow Basalt Fragments	1.2-total	A	-	-				L	Weathered patches on surface.	No glass. (2 samples total)
9-29	Pillow Basalt	0.7	A	-	-				L	Palagonitized.	Large blocky fragments, glassy.
9-30	Basalt	0.7	A	-	TR OL.					-	Glassy margins with spherulites.
9-31	Basalt	0.7	A	-	-				L	Palagonitized.	Pahoehoe texture.
9-32	Pillow Basalt	0.6	A	-	-				L	-	Rounded, weathered patches. No glass.
9-33	Pillow Basalt	0.3	A	-	-				L	Palagonitized.	Small fragment with glass.
9-(34-35)	Pillow Basalt	6.7-total	A	-	-				L	Weathered patches on surface.	No glass. (2 samples total)
9-(36-43)	Basalt	0.2	A	-	-	tr			M	-	No glass. (8 samples total)
9-44	Basalt fragment	0.9	A	-	-				L	-	Small pieces of basalt with glass.
9-45	Serpentinite	1.2	-	-	-					-	Light-colored, blastoporphyritic.
9-46	Serpentinite	0.6	-	-	-					-	Dark with light serpentine vein crosscutting.
9-47	Serpentinite	0.1	-	-	-					-	Aragonite coating.
9-(48-52)	Serpentinite	3.9-total	-	-	With porphyroclasts.					-	5 samples total. Boulder sized.
9-(53-56)	Serpentinite	2.5-total	-	-	-					-	Slickensides noted. (4 samples total)
9-(57-68)	Serpentinite	12.4-total	-	-	-					-	Well crystallized serpentine. (12 samples total)
9-(69-70)	Serpentine Fragments	0.7	-	-	-					to talc?	(2 samples total)
9-(71-73)	Serpentinite Fragments	11 tot.	-	-	-					-	(3 samples total)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 9 DREDGE 9 DESCRIBED BY Thompson DATE 26 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9-74	Serpentinite	3.9	-	-	Large relic PX porphyroclasts.					-	Boulder size, blastoporphyritic; dark in color.
9-75	Serpentinite	1.6	-	-	-					-	Serpentine well developed on slickenside surface.
9-(76-77)	Serpentinite	3.4 tot.	-	-	-					Well crystalline serpentine.	Boulder size. (2 samples total)
9-(78-79)	Serpentinite	1.8 tot.	-	-	Large relic PX porphyroclasts.					-	Serpentine well developed on slickenside surface.
9-80	Serpentinite	0.9	-	-	With porphyroclasts.					-	(2 samples total) Dark color; boulder size.
9-(81-82)	Serpentinite	1.7 tot.	-	-	-					Well crystalline serpentine.	Boulder size. (2 samples total)
9-(83-84)	Serpentinite	1.6 tot.	-	-	With porphyroclasts.					-	Serpentine well developed on slickenside surface.
9-85	Serpentinite	0.7	-	-	-					-	(2 samples total) Dark color; boulder size.
9-86	Serpentinite	0.2	-	-	-					-	Aragonite needles noted.
9-87	Serpentinite	0.2	-	-	-					-	Aragonite prisms.
9-88	Serpentinite	0.4	-	-	-					-	Mottled serpentinite Bluish color.
9-(89-92)	Serpentinite Fragments	8.2 tot.	-	-	-					-	(4 samples total)
9-(93-96)	Pillow Basalt Fragments	9.5 tot.	F	-	5%-OL.				L	Palagonitized glass.	Glassy margin. (4 samples total)
9-(97-103)	Fragments of Pillow Basalt	11 tot.	A	-	-				L	-	Rounded with fresh glass. (7 samples total)
9-(104-105)	Basalt	3.6 tot.	A	-	-				M	-	No glass. (2 samples total)
9-106	Metabasalt	0.6	A	-	-				M	-	Notable weathering.
9-(107-109)	Basalt Fragments	-	A	-	-				L	-	(3 samples total)
9-(110-111)	Serpentinite Fragments	>18 tot.	-	-	-					-	Large pieces. (2 samples total)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 10 DREDGE 10 DESCRIBED BY Thompson DATE 26 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
10-(1-2)	Basalt	24 tot.	F	-	-			TR	L	Palagonitized glass.	2 boulders weighing 9 kg and 15 kg.
10-3	Metabasalt	9.0	F	-	-				M	Highly altered.	-
10-4	Basalt	1.0	F	-	Pg phenocrysts.			TR	L	Palagonitized glass.	Mn stained.
10-5	Basalt	1.0	F	-	Pg phenocrysts.			TR	L	-	Mn stained.
10-6	Basalt	3.0	F	-	Pg phenocrysts.			TR	L	Palagonitized glass.	Mn stained.
10-7	Basalt Breccia	0.7	F	Fine grained matrix.	M-grained basalt clasts.				M	Highly altered basalt.	Most of the basaltic clasts are glass.
10-8	Basalt Breccia	1.2	M	Medium grained matrix.	C-grained basalt clasts.			TR	H	Very highly altered.	Most of the basaltic clasts are glass.
10-(9-10)	Metabasalt	0.5 tot.	F	-	-			1mm	H	Very highly altered.	Highly veined. (2 samples total)
10-11	Basalt Breccia	4.0	F	-	Some c-grained basalt clasts noted.			TR	H	-	Clayey basalt breccia.
10-12	Basalt	4.0	F	-	3% OL and PG.			TR	M	TR palagonite.	-
10-(13-14)	Basalt Breccia	2.3 tot.	F	-	Medium grained basalt clasts.			TR	H	-	Many of the clasts are glassy. (2 samples total)
10-15	Basalt Fragments	0.1	F	-	-				M	-	White crystals on surface.
10-16	Basalt Pebble	0.1	F	-	-			5mm	M	-	Notable Mn crust.
10-17	Basalt	0.5	F	-	-			TR	H	-	-
10-18	Basalt	0.5	F	-	-			TR	H	-	-
10-(19-30)	Basalt	5.8 tot.	F	-	-			TR	H	-	12 samples total- each weighing 0.5 kg.
10-31	Basalt	0.5	F	-	-				H	-	-
10-32	Basalt Fragments	2.0	F	-	-				M	Palagonitized.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 10 DREDGE 10 DESCRIBED BY Thompson DATE 26 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
10-33	Small Basalt Fragments	0.5	F	-	-	—	—	—	L	-	-
10-34	Dredge Fragments	0.2	F	-	-	—	—	TR	L	-	Palagonite and Mn crust.
10-35	Basalt Fragments	7.0 tot.	F	-	-	—	—	—	H	-	Numerous pieces.
				Station 11	Dredge 11						
11-(1-2)	Basalt	10.9 tot.	A	-	-	—	—	TR	L	-	Boulder size. (2 samples total)
11-3	Basalt	1.0	A	-	-	TR	—	—	L	Palagonitized glass on sides.	-
11-4	Basalt	0.7	A	-	TR-PG.	TR	—	—	L	Palagonitized glass on sides.	Platy morphology. Some glass noted.
11-(5-12)	Basalt	9.1 tot.	F	-	Pg abundant.	TR	-	TR	L	Palagonitized basalt fragments.	(8 samples total)
11-13	Basalt	3.0	A	-	-	1%	—	—	L	Palagonitized.	-
11-(14-17)	Basalt	2.0 tot.	A	-	-	30%	—	—	L	Palagonitized glass.	Large vesicles on underside. (4 samples total)
11-18	Basalt Fragments	1.0	A	-	Some samples with abundant Pg.	X	—	—	L	Palagonitized glass.	Number of small pieces, Variable morphologies.
11-19	Basalt	9.0	F	-	-	—	—	—	L	Palagonitized	Large boulder size.
11-(20-34)	Basalt	22.7 tot.	F	-	-	—	—	TR	L	Sample #11-25 is scoriaceous.	Mn staining noted. (15 samples total)
11-35	Basalt Fragments	0.5	F	-	-	—	—	—	M	---	Boulder size, layered structure. Notable weathering.
11-36	Lithified Sediment	1.2	-	-	-	—	—	—	-	---	Mostly clay, small slab.
11-(37-38)	Basalt	4.1 tot.	F	-	3% PG.	—	—	TR	L	---	Attached lithified sediment. (2 samples total)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 12 DREDGE 12 DESCRIBED BY Thompson DATE 27 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
12-1	Clay sample	1 pt	-	-	-					-	-
12-2	Gabbro	13.0	C	-	White, crystalline layer. (anorthite?)				M	-	Large boulder, apparent layering.
12-3	Gabbro	13.0	C	-	-				M	-	Large boulder.
12-4	Basalt	6.0	F	-	-			TR	L	-	Mn staining noted.
12-5	Basalt	2.0	F	-	-			TR	M	-	Mn staining noted.
12-(6-10)	Basalt	3.4 tot.	F	-	-			TR	M	Close to a meta-basalt in a chloritized state?	(5 samples total)
12-(11-12)	Gabbro	10.2 tot.	C	-	-				L	-	(2 samples total)
12-(13-15)	Gabbro	12.3 tot.	C	-	-				M	-	(3 samples total)
12-(16-19)	Gabbro	5.2 tot.	C	-	-				L	-	(4 samples total)
12-(20-21)	Gabbro	3.6 tot.	C	-	White crystalline layer. (anorthite?)				M	-	Apparent layering noted. (2 samples total)
12-22	Gabbro	1.0	M	-	-				L	-	-
12-(23-27)	Gabbro	4.5 tot.	C	-	White crystalline layer dominant.			TR	M	-	Layering apparent. (5 samples total)
12-28	Gabbro	0.1	F	-	-					-	Platy morphology.
12-(29-30)	Gabbro	1.0 tot.	C	-	-				L	-	(2 samples total)
12-31	Basalt	0.5	F	-	-			TR	L	-	Mn staining noted.
12-32	Gabbro	2.0	C	-	White crystalline layer. (anorthite?)			5mm	M	-	Thick Mn crust.
12-33	Gabbro	1.0	C	-	-				H	-	Weathering in center of sample.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 12 DREDGE 12 DESCRIBED BY Thompson DATE 27 May 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
12-34	Peridotite	1.0	C	-	-			TR	M	Serpentinized	Blastoporphyritic texture.
12-35	Serpentine	0.2	-	-	-			1mm	-	-	-
12-36	Fragments	0.3	M	-	-			1mm	M	-	Mostly basalt (one cut).
				Station 13	Dredge 13						
13-1	Sediment	1 pt.	-	-	-					-	Foram ooze and clay from pipe dredge.
				Station 14	Dredge 14						
14-1	Foram mud and ooze.	1 gal.	-	-	-					-	-
14-(2-6)	Greenstone Breccia	3.9 tot.	C	-	-			5mm	M	-	5 samples total. Friable, thick Mn crust.
14-7	Greenstone	0.4	C	-	-					-	Small fragments, brecciated.
14-8	Greenstone	0.2	C	-	-					-	A small fragment.
				Station 15	Dredge 15						
15-1	Brittle Star	1 pt.	-	-	-					-	-
15-2	Foram mud and ooze	2 gal.	-	-	-					-	From dredge bag.
15-3	Foram mud and ooze	1 gal.	-	-	-					-	From pipe dredge.
15-4	Metabasalt	9.0	F	-	-				L	-	Large boulder, possibly greenstone.
15-5	Metabasalt	9.0	F	-	-				L	-	Possibly brecciated greenstone.
15-6	Metabasalt	14.0	F	-	Secondary aragonite on surface?				M	-	-
15-7	Metabasalt	22.0	C	-	-				L	-	Large boulder size.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 15 DREDGE 15 DESCRIBED BY Thompson DATE 24 June 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15-8	Metabasalt	19.0	C	-	-				L	-	Brecciated greenstone.
15-9	Metabasalt	10.0	C	-	-				L	-	Brecciated greenstone.
15-10	Basalt	2.0	A	-	1% weathered Pg.				M	Altered basalt. Attached sediment. palagonite noted. Notable weathering.	
15-11	Basalt	1.0	F	-	3% Pg and Px(?)				L	Early stages of metamorphism? Calcite? veining.	
15-12	Metabasalt	3.0	C	-	-				L	-	-
15-13	Metabasalt	2.0	M	-	Abundant coarse grained Pg.				L	Chloritized.	-
15-14	Basalt	1.0	A	-	-	3%	S	-	M	Notable weathering.	Attached sediment coating (lithified).
15-15	Metabasalt	1.0	C	-	Abundant coarse grained Pg.				L	Chloritized.	-
15-(16-17)	Consolidated Sand	2.0 tot.	C	-	-					Recrystallized consolidated sand.	(2 samples total)
15-18	Consolidated Sand	3.0	C	-	-					Recrystallized mosaic.	Contains mineral, rock and gravel fragments.
15-(19-21)	Metabasalt	2.0 tot.	M	-	-				L	Chloritized.	(3 samples total)
15-22	Consolidated Sand	1.0	C	-	-					Recrystallized consolidated sand.	-
15-23	Consolidated Sand	1.0	F	-	-				L	-	Sand sized sediment.
15-24	Mudstone	1.0	F	-	-					-	Well consolidated.
15-25	Metabasalt	0.2	-	-	Aragonite(?) crystals on surface.				L	-	-
15-(26-27)	Metabasalt	2.0 tot.	C	-	-				L	-	Coarsely crystalline. (2 samples total)
15-(28-35)	Metabasalt	11.4 tot.	F	-	-			TR	L	Slickensides noted.	(8 samples total)
15-(36-37)	Metabasalt	0.9 tot.	G	-	-			TR	L	-	Coarsely crystalline. (2 samples total)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 15 DREDGE 15 DESCRIBED BY Thompson DATE 24 June 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15-(38-41)	Metabasalt	3.2 tot.	F	-	-			TR	L	-	(4 samples total)
15-(42-44)	Metabasalt	10.5 tot.	F	-	-			TR	L	Notable alteration.	Numerous rock fragments and weights.
				Station 17	Dredge 17						
17-(1-9)	Peridotite	>51 tot.	C	-	-			1-2 mm	M	Serpentinized and weathered.	Boulder size. (9 samples total)
17-(10-14)	Serpentinite	14.7 tot.	-	-	-					-	Massive character. (5 samples total)
17-(15-16)	Peridotite	2.0 tot.	C	-	-				M	Serpentinized.	(2 samples total)
17-17	Peridotite	1.0	C	-	-				M	Serpentinized, weathered.	Odd texture.
17-18	Serpentinite	1.0	-	-	-					-	Massive character, peculiar red weathering.
17-19	Serpentinite	1.5	-	-	-					-	-
17-20	Serpentinite	1.0	-	-	-					-	Layering noted.
17-21	Serpentinite	0.5	-	-	-					-	Layering more notable (flow structure?).
17-22	Serpentinite	1.0	-	-	-				L	White alteration rind.	Mottled dark serpentine.
17-23	Serpentinite	1.0	-	-	-				H	Highly weathered.	Overall grayish-white color.
17-24	Breccia	1.0	C	-	Large weathered basalt clasts.				L	-	Reddish (iron oxide?) Cement.
17-25	Sandstone	1.0	M	-	-				M	Weathered.	Brecciated?
17-26	Peridotite	7.0	C	-	-				M	Serpentized.	-
17-27	Serpentinite	3.0	-	-	-					-	Massive character, slickensides noted.
17-28	Peridotite	2.7	C	-	-				M	Serpentinized.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 17 DREDGE 17 DESCRIBED BY Thompson DATE 24 June 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
17-(29-30)	Serpentinite	0.9 tot.	F	-	-				H	Notable weathering.	Chlorite? (2 samples total)
17-31	Sandstone Fragments	2.0	M	-	-			TR	M	Notable weathering.	Brecciated?
17-32	Serpentine/Greenstone Fragments	14.0	-	-	-			TR	M	Peridotite to Serpentine.	Slickenside surfaces noted massive serpentinite, brecciated.
17-33	Peridotite	9.0	C	-	-				M	-	Numerous weathered pieces. Some consolidated.
17-(34-38)	Serpentine/Greenstone Fragments	38.0 tot.	C	-	-				M	Serpentinized.	Numerous fragments, totalling 38 kg.
				Station 18	Dredge 18						
18-1	Sand and Pebbles	1 pt.	-	-	-				L	-	Rock fragments.
				Station 19	Dredge 19						
19-1	Metabasalt/ Gabbro	7.0	M	-	-			1-2 mm	L	-	Large boulder size.
19-2	Metabasalt/ Gabbro	3.2	M	-	-			5mm	L	-	Large boulder size. Breccia noted on outer edg
19-3	Metabasalt/ Gabbro	2.0	C	-	-			1-2 mm	L	-	Coarse grained interior.
19-4	Metabasalt/ Gabbro	3.0	M	-	-			5mm	L	-	Breccia on outer edge.
19-5	Breccia	0.5	-	-	-				L	-	Red cement (iron oxide?).
19-(6-12)	Metabasalt/ Gabbro	2.0 tot.	C	-	-			TR	L	-	(7 samples total)
19-13	Fragments	1.0	-	-	-				L	-	Numerous small rock fragments.
				Station 20	Dredge 20						
20-1	Foram ooze	1 gal	C	-	-					-	From pipe dredge.
20-2	Foram ooze	1 pt.	-	-	-					-	A few mineral grains noted.

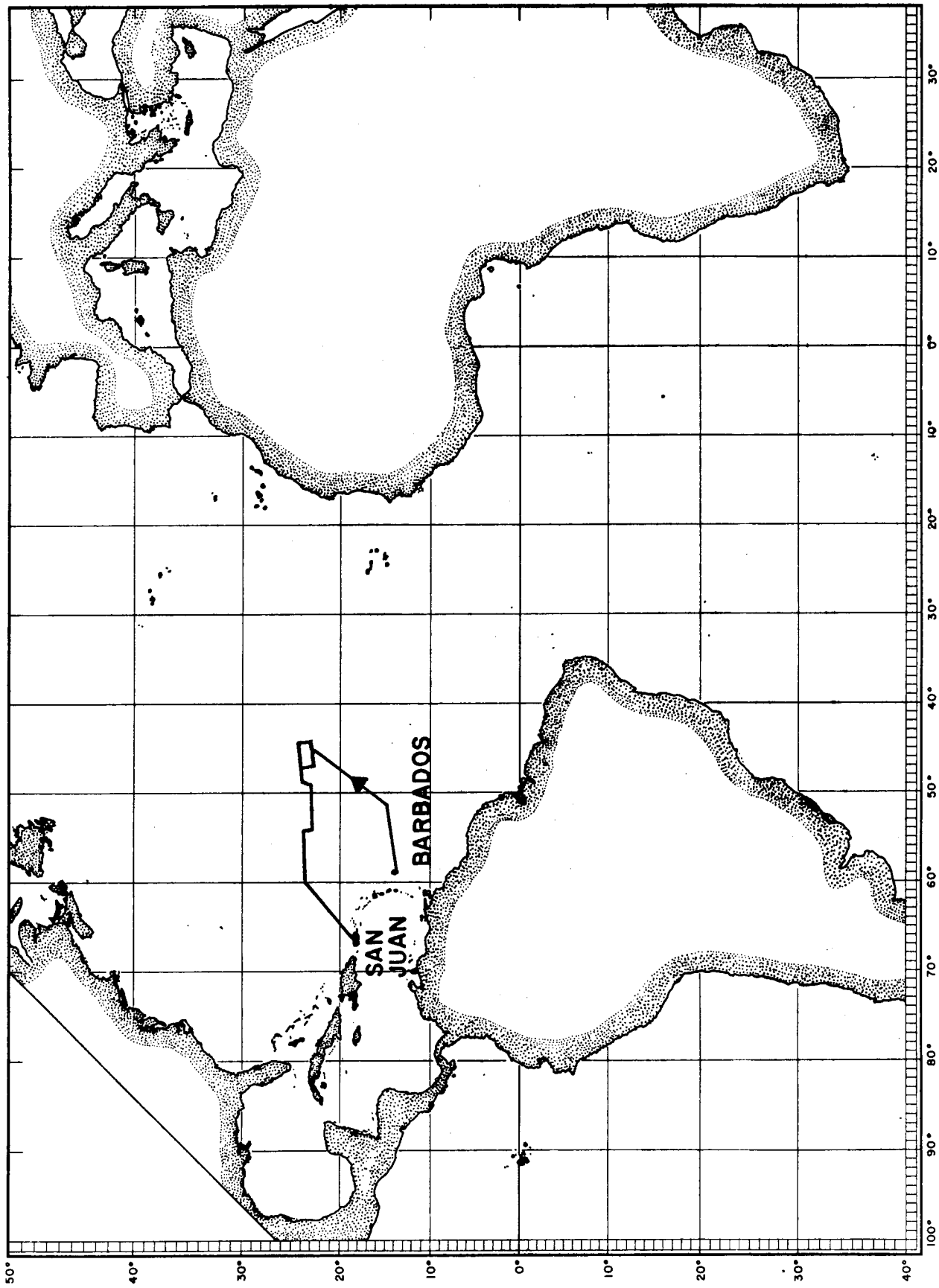
WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 60 STATION 21 DREDGE 21 DESCRIBED BY Thompson DATE 26 June 1971

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
21-1	Foram ooze	1 pt.	C	-	-					-	From pipe dredge, a number of pteropods and other shells noted.
21-2	Basalt/ Metabasalt	18.0	C	-	-				L	-	Large boulder size.
21-3	Basalt	9.0	M	-	-			1-2 mm	L	-	Large boulder size.
21-(4-5)	Basalt	7.7 tot.	C	-	-				M	-	Carbonate veining(?) noted. (2 samples total)
21-(6-8)	Basalt	2.5 tot.	F	-	-				M	-	Carbonate veining(?) noted. (3 samples total)
21-(9-12)	Basalt	9.5 tot.	M	-	Pg Noted.			1-2 mm	L	-	(4 samples total)
21-13	Coral	-	-	-	-					-	A small piece.
				Station 22	Dredge 22						
22-1	Foram ooze	1 pt.	-	-	-					-	Some mineral grains.
22-2	Metabasalt/ Breccia	0.1	C	-	-			10	-	-	Botryoidal Mn crust.
22-3	Mn Crust	0.5	-	-	-			X	-	-	Massive and radial character.
22-4	Mn Crust Fragments	1.0	-	-	-			X	-	-	A number of pieces.
				Station 23	Dredge 23						
23-1	Foram ooze	1 pt.	-	-	-					-	From pipe dredge.

ATLANTIS II 78 LEG 2

4 OCT.-1 NOV., 1973



********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	78	2	0001	0000	8	731015	23 13.0'N	44 43.0'W	9	77.34	0001	3090.	2325.	027K	15	0000	0	
AII	78	2	0002	0000	8	731015	23 14.0'N	44 42.0'W	9	77.34	0002	2965.	2360.	006K	15	0000	0	
AII	78	2	0003	0000	8	731015	23 13.0'N	44 55.0'W	9	77.34	0003	3990.	3380.	200K	15	0000	0	
AII	78	2	0006	0000	8	731017	23 4.0'N	45 10.0'W	9	77.35	0006	3255.	2435.	013K	15	0000	0	
AII	78	2	0007	0000	8	731019	22 59.0'N	45 42.0'W	9	77.25	0007	3445.	3000.	015K	15	0000	0	
AII	78	2	0008	0000	8	731019	22 58.0'N	45 51.0'W	9	77.25	0008	3570.	3200.	110K	15	0000	0	
AII	78	2	0009	0000	8	731020	22 58.0'N	45 56.0'W	9	77.25	0009	3860.	2910.	023K	15	0000	0	
AII	78	2	0010	0000	8	731020	23 0.0'N	46 13.0'W	9	77.36	0010	3310.	2780.	009K	15	0000	0	
AII	78	2	0011	0000	8	731021	23 3.0'N	47 4.0'W	9	77.36	0011	4335.	3710.	001K	15	0000	0	
AII	78	2	0012	0000	8	731022	23 11.0'N	48 46.0'W	9	77.38	0012	4830.	3880.	015K	15	0000	0	
AII	78	2	0013	0000	8	731023	23 15.0'N	49 11.0'W	9	77.39	0013	4995.	4140.	023K	15	0000	0	
AII	78	2	0014	0000	8	731023	23 16.0'N	49 13.0'W	9	77.39	0014	4910.	3705.	025K	15	0000	0	
AII	78	2	0015	0000	8	731024	23 24.0'N	50 45.0'W	9	78.30	0015	5420.	4580.	160K	15	0000	0	
AII	78	2	0016	0000	8	731025	23 25.0'N	52 2.0'W	9	78.32	0016	5615.	4810.	100K	15	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 78 STATION 1 DREDGE 1 DESCRIBED BY G. Thompson DATE 15 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1-1	Basalt	2.7	A	-	-			1mm	L	-	-
1-2	Metabasalt	0.9	A	-	-			1mm	L	Chloritized.	Lightly veined.
1-3	Metabasalt	0.68	A	-	-			1mm	L	Chloritized.	Lightly veined.
1-4	Metabasalt	0.7	A	-	-			1mm	L	Chloritized.	Veined with pyrite.
1-5	Basalt	0.45	A	-	-			5mm	L	-	-
1-6	Basalt	0.45	A	-	-			5mm	L	-	-
1-8	Basalt	0.45	A	-	-			5mm	L	-	-
1-15	Basalt	0.22	A	-	-			5mm	L	-	-
1-19	Calc Ooze	9.0	-	-	-			2mm	-	Well lithified.	Burrowed.
1-20	Calc Ooze	3.6	-	-	-			2mm	-	Well lithified.	Burrowed.
1-22	Calc Ooze	0.9	-	-	-			2mm	-	Well lithified.	Burrowed.
				Station 2	Dredge 2						
2-1	Calc Ooze	3.6	-	-	-					-	Foram ooze in gallon jar.
2-2	Metabasalt	1.35	-	Chlorite.	-			2mm	L	Greenstone.	Slickensides.
2-3	Basalt	0.1	A	-	-			1mm	L	-	Small pebbles.
2-4	Coral	0.05	-	-	-					-	Long thin branch.
2-5	Calc Ooze	6.75	-	-	-					-	Well lithified with burrows and Mn stains.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 3 DREDGE 3 DESCRIBED BY G. Thompson DATE 17 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
3-1	Basalt	12.5	A	-	-	——		.5	L	-	Sub angular.
3-2	Basalt	13.0	A	-	-	——		1mm	L	-	Sub angular.
3-3	Basalt	11.2	A	-	-	tr		1mm	L	-	Angular block.
3-6	Basalt	9.0	A	-	-	tr	-	.5	F	Slightly palagonitized.	Some fresh glass.
3-7	Basalt	6.8	A	-	-	tr	-	.5	F	Slightly palagonitized.	Some fresh glass.
3-8	Basalt	4.5	A	-	-	——		.5	F	Slightly palagonitized.	Some fresh glass.
3-10	Basalt	6.7	A	-	-	——		.5	F	-	No glass.
3-11	Basalt	14.0	A	-	-	——		.5	F	-	No glass.
3-12	Basalt	12.5	A	-	-	——		.5	F	-	Small amount of glass.
3-13	Basalt	9.0	A	-	-	——			L	-	Bag of glass free cobbles.
3-18	Basalt	4.5	A	-	Pg 60%, some Ol.	——		.5	L	-	Bag of cobbles.
3-24	Basalt	0.7	A	-	None.	——		——	F	-	Angular/fresh glass.
3-25	Basalt	0.9	A	-	None.	——		——	F	-	Angular/fresh glass.
3-26	Basalt	1.3	A	-	None.	——		——	F	-	Angular/fresh glass.
3-28	Basalt	1.3	A	-	None.	——		——	F	-	Angular/fresh glass.
3-30	Basalt	0.9	A	-	None.	——		——	F	-	Angular/fresh glass.
3-33	Basalt	1.3	A	-	None.	——		——	F	-	Angular/fresh glass.
3-34	Basalt	0.6	A	-	None.	——		——	F	-	Angular/fresh glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 3 DREDGE 3 DESCRIBED BY G. Thompson DATE 17 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
3-39	Basalt	0.9	A	-	None.				L	-	Subangular.
3-41	Basalt	1.35	A	-	None.				L	-	Subangular.
3-43	Basalt	0.9	A	-	None.				L	-	Subangular.
3-46	Basalt	0.7	A	-	None.				L	-	Subangular.
3-49	Basalt	0.9	A	-	20%pg, 2%ol.				F-L	Slightly palagonitized.	Glassy.
3-50	Basalt	0.45	A	-	20%pg, 2%ol.				F-L	Slightly palagonitized.	Glassy.
3-51	Basalt	0.9	A	-	20%pg, 2%ol.				F-L	-	No glass.
3-52	Basalt	0.9	A	-	20%pg, 2%ol.				F-L	-	No glass.
3-56	Basalt	1.35	A	-	-			.5	M	-	No glass/subangular.
3-57	Basalt	1.35	A	-	-			.5	M	-	No glass/subangular.
3-58	Basalt	2.0	A	-	-			.5	M	-	No glass/subangular.
3-59	Basalt	2.25	A	-	-			.5	M	-	No glass/subangular.
3-61	Basalt	1.8	A	-	-			.5	M	-	No glass/subangular.
3-75	Basalt	0.9	A	-	-			.5	M	-	No glass/subangular.
3-79	Basalt	0.9	A	-	-			.5	M	-	No glass/subangular.
3-98	Palagonite Breccia	0.7	M	-	-				H	With glass and ash.	-
3-99	Plag.-Phyric Basalt	0.32	A	-	45%pg.	3%				-	Large brown vugs.
3-102	Basalt	0.9	A	-	None.	10% center			F	-	Sub-rounded extrusion, glassy.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 3 DREDGE 3 DESCRIBED BY G. Thompson DATE 17 Oct.73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
3-103	Basalt	0.9	A	-	None.	10% center			F	-	Sub-rounded extrusion, glassy.
3-106	Basalt	0.68	A	-	40%pg, 3%ol.				F	-	Sub-rounded.
3-107	Basalt	0.9	A	-	40%Pg,tr. ol.				F	-	Sub-rounded.
				Station 6	Dredge 6						
6-1	Lithified clay	0.45	-	-	-			.5	-	-	In jar.
6-3	Basalt	9.2	A	-	-				L	-	Calc ooze over glass margin, large pillow.
6-4	Basalt	2.25	A	-	-			tr	L	Thick palagonite.	-
6-5	Basalt	0.45	A	-	-			.5	L	-	Cobble.
6-6	Basalt	0.22	A	-	-			.5	L	-	Cobble.
6-7	Basalt	0.2	A	-	-			.5	L	-	Cobble.
				Station 7	Dredge 7						
7-1	Basalt Pillow	12.5	A	-	Very few.			5	L	Palagonite rind.	-
7-2	Basalt	1.35	A	-	Very few.			1.5	cm L	Thin palagonite margin.	Sub-rounded.
7-3	Basalt	1.35	A	-	10%pg.			.5	L	Thin palagonite margin.	Sub-rounded.
7-4	Basalt	1.35	A	-	Very rare pg.			tr	L	-	-
7-5	Basalt	0.45	A	-	Very rare pg.			tr	L	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 8 DREDGE 8 DESCRIBED BY G. Thompson DATE 21 Oct. '73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-1	Basalt Pillow	19	A	-	-			2mm	L	Palagonite and glass rind.	-
8-2	Basalt	10	A	-	-			3mm	M	Palagonite and glass rind.	-
8-3	Basalt	9.0	A	-	-			3mm	M	Palagonite and glass rind.	-
8-4	Basalt	9.5	A	-	-			2.5mm	M	Palagonite and glass rind.	-
8-5	Basalt	6.8	A	-	-			2.5mm	M	Palagonite and glass rind.	-
8-6	Basalt	4.5	A	-	-			1cm	M	-	-
8-9	Basalt	3.6	A	-	-			1cm	M	-	-
8-11	Basalt	2.7	A	-	-			1cm	M	-	-
8-16	Palagonite Breccia	4.5	M	-	-				H	Palagonite and clay.	A few basalt fragments.
8-17	Basalt	3.15	A	-	tr. pg.			tr	M	Palagonite rind.	-
8-18	Basalt	3.15	A	-	tr. pg.			tr	M	-	-
8-20	Basalt	0.9	A	-	-			1cm	M	-	-
8-23	Basalt	0.45	A	-	-			1cm	M	-	-
8-25	Basalt	0.45	A	-	-			1cm	M	-	-
8-33	Basalt	0.9	A	-	-			1mm	L	Palagonite rind.	-
8-34	Basalt	0.9	A	-	-			1mm	L	Palagonite rind.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 9 DREDGE 9 DESCRIBED BY G. Thompson DATE 22 Oct. 73

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9-1	Basalt	6.75	A	-	15% Pg (altered).	—		5mm	L	Pg only.	-
9-2	Basalt	1.8	A	-	15% Pg(altered).	—		5mm	L	Pg only.	-
9-3	Basalt	1.35	A	-	15% Pg(altered).	—		5mm	L	Chill margin Palagonite rich.	-
9-4	Basalt	1.8	A	-	-	—		4mm	M	-	-
9-5	Basalt	0.9	A	-	-	—		4mm	M	-	-
9-7	Basalt	0.9	A	-	-	—		4mm	M	-	-
9-8	Basalt	0.45	A	-	-	—		4mm	M	-	-
9-11	Basalt	0.45	A	-	-	—		4mm	M	-	-
9-12,13	Fe/Mn Crust	0.45	-	-	-	—		-	-	-	Broken from basalt bould
9-14	Basalt	0.9	A	-	-	—		tr	M	-	-
9-16	Basalt	0.45	A	-	-	—		tr	M	-	-
9-21,22, 23,24	Fe/Mn Crust	2.0	M	-	-	—				-	Botryoidal forms with co shaped, crystalline features.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 10 DREDGE 10 DESCRIBED BY G. Thompson DATE 23 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
10-1	Basalt	3.15	A	-	-			7mm	M	-	Attached lithified ooze. Friable Fe/Mn crust.
10-2	Basalt	1.35	A	-	-			5mm	M	Light palagonite rim.	Cooling margin.
10-3	Basalt	1.35	A	-	-			1mm	M	-	Large chunk lithified ooze
10-4	Basalt	0.45	A	-	-			7mm	M	-	Friable crust.
10-5	Basalt	0.45	A	-	-			7mm	M	-	Friable crust.
10-7	Basalt	0.45	A	-	-			7mm	M	-	Friable crust.
10-9	Fe/Mn crust	0.25	M	-	-					Small quantity of palagonite.	Freshly broken.
				Station 11	Dredge 11						
11-1	Calc Ooze	0.95	F	-	-					Well lithified	with burrows and Mn stains.
11-2	Calc Ooze	0.2	F	-	-					Well lithified	with burrows and Mn stains.
				Station 12	Dredge 12						
12-1	Unconsolidated Ooze	1.35	-	-	-					-	Stored in jar with rock fragments.
12-2	Basalt	4.5	A	-	-			10	H	Slight palagonite rind.	Cooling margin.
12-3	Fe/Mn Crust	0.9	-	-	-					-	Thick, friable.
12-4,5,6	Fe/Mn Crust	0.9ea	-	-	-					-	Thick, friable.
12-7,8,9, 10,11,12	Fe/Mn Crust	0.45ea	-	-	-					-	Thick, friable.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 13 DREDGE 13 DESCRIBED BY G. Thompson DATE 25 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
13-1	Unconsolidated Ooze	0.9	-	-	-					-	Calc ooze with forams and rock fragments.
13-2	Fe/Mn Crust	4.5	-	-	-					-	Thick and friable.
13-3	Fe/Mn Crust	3.6	-	-	-					-	Thick and friable.
13-4	Basalt	0.9	C	-	Plag-5% (altered).				M	-	-
13-5	Basalt	0.45	C	-	Plag-5% (altered).				M	-	-
13-9,10,11	Fe/Mn Crust	0.9ea	-	-	-					-	Thick, friable.
13-12 thru 30	Fe/Mn Crust	0.45ea.	-	-	-					-	Thick, friable.
				Station 14	Dredge 14						
14-1	Basalt Pillow	9.5	A	-	-			7mm	M	Palagonite rind.	Cooling margin.
14-2	Basalt Pillow	0.9	A	-	-				M	Palagonite rind.	Possibly a few patches of fresh glass.
14-3	Basalt	2.25	A	-	-			2mm	L	-	-
14-4	Basalt	2.25	A	-	-				L	-	-
14-5	Basalt	2.25	A	-	-				L	-	-
14-6	Basalt	0.7	A	-	-				L	-	-
14-10	Basalt	0.7	A	-	tr. pg.			tr	M	-	-
14-12	Basalt	0.45	A	-	tr. pg.			tr	M	-	-
14-13,14 16	Basalt	0.45ea.	A	-	-			tr	M	Palagonite rind.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 15 DREDGE 15 DESCRIBED BY G. Thompson DATE 26 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15-2	Basalt	4.5	A	-	-			5	M	Palagonite rind.	Chilled margin.
15-3	Basalt	3.6	A	-	-			5	M	Palagonite rind.	Chilled margin.
15-4	Palagonite Breccia	0.9	M	-	-			10	H	-	-
15-6	Basalt	3.15	A	-	-			15	L	-	-
15-7	Basalt	1.4	A	-	-			15	L	-	-
15-9	Basalt	4.5	A	-	-			15	L	-	-
15-5	Fe/Mn	2.7	-	-	-					Small layer of palagonite within.	Crust.
15-10	Fe/Mn Slab	11.3	-	-	-					Small layer of palagonite within.	-
15-11	Fe/Mn Slab	9.0	-	-	-					Small layer of palagonite within.	-
15-13	Fe/Mn Slab	4.5	-	-	-					-	-
15-14	Fe/Mn Slab	4.5	-	-	-					-	-
15-27	Fe/Mn Nodule	0.5	-	-	-					-	Spherical.
15-28	Fe/Mn Nodule	0.25	-	-	-					-	Spherical.
15-30	Fe/Mn Nodule	0.25	-	-	-					-	Spherical.
15-42	Fe/Mn Nodule	22.5	-	-	-					-	-
15-43	Fe/Mn Nodule	18.0	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

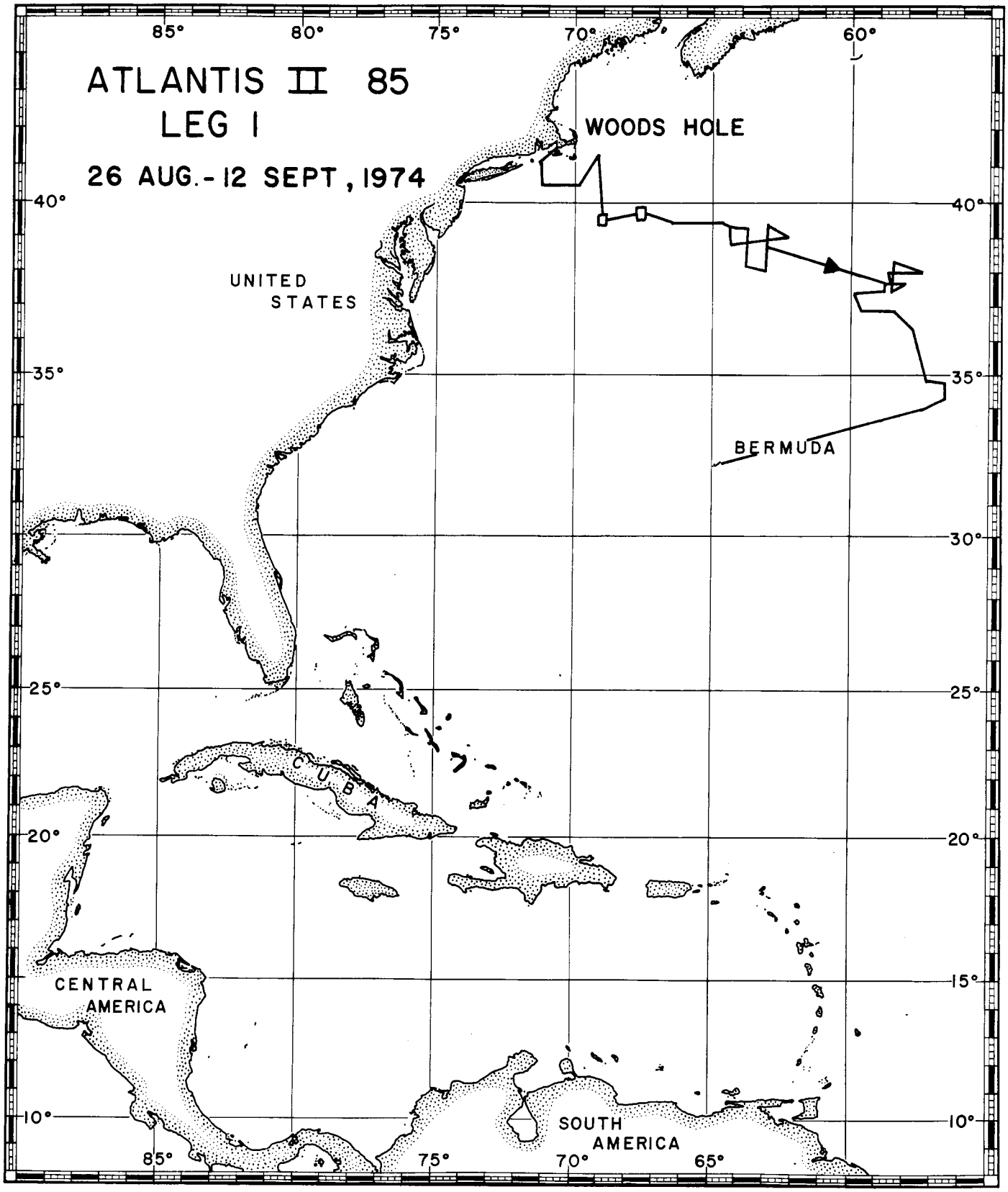
CRUISE AII-78 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson DATE 28 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
16-1	Fe/Mn Crust	9.0	-	-	-					Very little basalt on underside.	Friable.
16-2	Basalt	4.5	A	-	tr. Pg, tr Ol.			tr	M	Palagonite rind.	-
16-3	Palagonite Breccia	2.3	M	-	-				H	-	-
16-4	Basalt	0.9	A	-	tr. Pg			tr	-	Palagonite rind.	Glassy margin.
16-7	Basalt	9.0	A	-	-			5mm	L	-	-
16-8	Basalt	9.0	A	-	-			5mm	L	Slightly palagonitized rind.	-
16-9	Basalt	4.5	A	-	-			5mm	L	Slightly palagonitized rind.	-
16-10	Basalt	3.2	A	-	-			5mm	L	Slightly palagonitized rind.	-
16-12	Fe/Mn Crust	2.3	-	-	-					-	-
16-15	Basalt	0.9	A	-	-			tr	-	Slightly palagonitized rind.	Pillow fragment.
16-16	Basalt	0.9	A	-	-			tr	-	Slightly palagonitized rind.	Pillow fragment.
16-17	Basalt	0.9	A	-	-			tr	-	Slightly palagonitized rind.	Pillow fragment.
16-21	Palagonite Breccia	0.45	M	-	-				H	-	-
16-23	Basalt	0.9	A	-	-			tr	-	-	-
16-28	Basalt	0.9	A	-	-			tr	-	-	-
16-33	Fe/Mn Crust	0.9	-	-	-					-	Friable.
16-34	Fe/Mn Crust	0.9	-	-	-					-	Friable.
16-35	Fe/Mn Crust	0.9	-	-	-					-	Friable.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII-78 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson DATE 28 Oct. 73

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
16-46	Basalt	0.45	A-F	-	-	—	—	—	M	-	-
16-47	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	tr. glass.
16-48	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	tr. glass.
16-50	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	tr. glass.
16-55	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	Subangular.
16-56	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	Subangular.
16-57	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	Subangular.
16-60	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	Subangular.
16-61	Basalt	0.45	A	-	-	—	—	tr	M	tr. palagonite.	Subangular.


ATLANTIS II 85
LEG I
26 AUG.- 12 SEPT, 1974
WOODS HOLE
UNITED STATES
BERMUDA
CUBA
CENTRAL AMERICA
SOUTH AMERICA
85°
80°
75°
70°
60°
65°
40°
35°
30°
25°
20°
15°
10°

********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	85	1	0001	0000	8	74 828	39 47.3'N	67 28.0'W	9	115.97	0001	3100.	2400.	095K	12	0000	0	
AII	85	1	0002	0000	9	74 828	39 51.6'N	67 22.4'W	9	115.97	0002	2000.	1700.	033K	12	0000	0	
AII	85	1	0006	0000	8	74 830	39 36.9'N	66 3.7'W	9	115.96	0006	3750.	2250.	035K	12	0000	0	
AII	85	1	0007	0000	8	74 830	39 40.0'N	66 3.0'W	9	115.96	0007	2800.	2225.	200K	12	0000	0	
AII	85	1	0008	0000	8	74 830	39 38.6'N	65 53.1'W	9	115.95	0008	3300.	2600.	143K	12	0000	0	
AII	85	1	0009	0000	8	74 9 1	38 41.4'N	64 9.2'W	9	115.84	0009	4300.	3300.	170K	12	0000	0	
AII	85	1	0010	0000	8	74 9 1	38 44.0'N	64 8.1'W	9	115.84	0010	2600.	1850.	074K	12	0000	0	
AII	85	1	0011	0000	8	74 9 1	28 50.0'N	64 3.8'W	9	115.84	0011	2300.	1800.	093K	12	0000	0	
AII	85	1	0012	0000	8	74 9 2	38 24.6'N	63 14.7'W	9	115.83	0012	3300.	3100.	095K	12	0000	0	
AII	85	1	0013	0000	8	74 9 3	38 25.3'N	63 13.9'W	9	115.83	0013	2500.	2200.	175K	12	0000	0	
AII	85	1	0014	0000	8	74 9 3	38 6.8'N	62 11.6'W	9	115.83	0014	2900.	2100.	086K	12	0000	0	
AII	85	1	0016	0000	8	74 9 6	36 49.3'N	62 12.5'W	9	115.62	0016	3900.	3300.	041K	12	0000	0	
AII	85	1	0017	0000	8	74 9 6	36 51.6'N	58 47.8'W	9	114.68	0017	2900.	2200.	114K	12	0000	0	
AII	85	1	0018	0000	8	74 9 7	36 30.0'N	59 24.7'W	9	114.69	0018	3800.	2550.	103K	12	0000	0	
AII	85	1	0019	0000	8	74 9 7	36 27.9'N	59 27.9'W	9	114.69	0019	2800.	2500.	095K	12	0000	0	
AII	85	1	0020	0000	8	74 9 7	36 21.2'N	59 11.5'W	9	114.69	0020	3200.	2300.	050K	12	0000	0	
AII	85	1	0021	0000	8	74 9 8	36 23.6'N	58 15.5'W	9	114.68	0021	3300.	2300.	011K	12	0000	0	
AII	85	1	0022	0000	8	74 9 8	36 16.1'N	58 19.5'W	9	114.68	0022	3500.	2900.	010K	12	0000	0	
AII	85	1	0023	0000	8	74 9 9	35 17.5'N	57 38.5'W	9	114.57	0023	3600.	2450.	008K	12	0000	0	
AII	85	1	0024	0000	8	74 910	34 28.1'N	56 47.8'W	9	114.46	0024	3050.	3000.	020K	12	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 1 DREDGE 1 DESCRIBED BY G. Thompson/S. Humphris DATE 8/28/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Porphyritic Basalt	1.6	A	-	4mm Pg.	-	10	-	F	-	Fresh hornblende present.
2	"	2.3	A	-	4mm Pg.	5%	10	-	F	-	-
4	"	0.5	A	-	2mm Pg.	-	10	-	F	-	-
5	Basalt	0.9	A	-	10% Pg.	5%	TR	-	F	-	Veined white min.
7	Porphyritic Basalt	1.3	A	-	4mm Pg.	-	10	-	F	-	-
10	"	2.2	A	-	4mm Pg.	5%	7	-	F	-	Contains angular aphanitic inclusions.
11	"	1.0	A	-	Fs + Hb (to 1cm).				F	-	Fs weathered.
15	"	0.7	A	-	Hb + Fs (5mm - 1.5mm).				F	-	Fs weathered.
19	"	1.6	A	-	Fs + Hb (to 1cm).				F		Chalky outer layer noted.
20	"	1.1	A	-	"				F	-	"
23	Basalt	1.6	A	-	Fs + Hb.					zeolitization of Fs and Hb.	Fs small, weathered brown and angular.
25	Volcanic Breccia	0.8 (matrix)	A	-	Fs + Hb in xenoliths.					-	Matrix contains xenocrysts.
28	Porphyritic Basalt	1.1	A	-	Hb + Fs (to 1cm).	7%	2	-	F	-	-
30	Breccia	0.9	-	-	-					Matrix is highly altered.	Fresher basaltic xenoliths.
35	"	2.7	-	-	Hb/Plag. xenolith.					"	Large basaltic xenoliths - (12 pieces).
38	Basalt	0.5	A	-	Some weathered Fs/Hb.				M	Highly altered.	-
43	"	2.3	A	-	Fs/Hb, Fs more abundant.				M	"	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 1 DREDGE 1 DESCRIBED BY G. Thompson/S. Humphris DATE 8/28/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
47	Basalt	5.0	A	-	Fs + Hb (very large).	TR	—		L	-	Xenoliths of Pg. / Hb. (to 9 cm).
48	"	1.0	A	-	Hb-fined grained, TR-Fs.	TR	—		L	-	-
49	"	0.6	A	-	Hb larger than 5mm, TR-Pg.	—	—	—	L	-	-
52	"	1.1	A	-	Very few Hb + Pg.	—	—	—	F	-	Chalky coating noted.
54	"	3.0	A	-	Fs + Hb (very large).	TR	—		L	-	-
56	"	0.9	A	-	(sparse) Hb + Hb xtl aggreg.	—	—	—	F	-	-
62	Calc Ooze	0.4	-	-	-	—	—	—	—	Lithified.	Crystals on surface.
63	"	0.6	-	-	-	—	—	—	—	"	"
68	Granitic erratic	1.4	-	-	-	—	—	—	—	-	Abundant mica.
69	Erratics	1.8	-	-	-	—	—	—	—	-	12 pebbles, well rounded.
74	Granitic erratics	1.0	-	-	-	—	—	—	—	Fe-stained.	Green algae.
79	Porphyritic Breccia	1.0	-	-	Pink grey + white.	—	—	—	—	-	Erratic.
89	Fe/Mn crust	0.3	-	-	-	—	—	—	—	-	-
93	Sand Stone Erratic	0.4	-	-	-	—	—	—	—	-	-
97	Quartzose meta-sediment	+20	-	-	-	—	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 2 DREDGE 2 DESCRIBED BY G. Thompson/S. Humphris DATE 8/28/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Erratics	~15	-	-	-					Fe/Mn stains.	To Lavrent/Labeyrie.
2	Mn Oxides	2.0	-	-	Hbl. in basalt inclusions.					-	Contains small pieces of altered basalt.
3	Basalt	1.3	A	-	Pg + hb.	25%	5%	-	H	-	Vesicles filled with white secondary mineral.
5	Tuff-(lithic)	0.1	-	-	X'tal of fs + hb.					-	Very fresh subrounded agglomerate.
7	Volcanic Erratic	0.5	-	-	-					-	5 pieces.
9	Granitic Erratics	2.7	-	-	-					-	-
12	Metamorphic Erratics	1.3	-	Chloritic.	-					-	-
13	Quartzose Metasediment	0.8	-	-	-					-	-
14	"	0.7	-	Micaceous.	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 6 DREDGE 6 DESCRIBED BY G. Thompson/S. Humphris DATE 8/28/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Erratics	5.0	-	Granitic and basic.	-					Fe-staining.	12 pieces.
2	Basalt	0.4	F	-	-	40%	10%	-	M	High (to green clay).	-
3	"	0.4	F	-	-				M	-	Green x'tal's in vesicles.
4	"	0.4	F	-	-			5	M	-	-
6	Fe/Mn nodule	0.5	-	-	-					-	Granitic nucleus.
7	"	0.9	-	-	X'tals in outer layer.					-	Highly altered basalt nucleus.
8	"	0.9	-	-	-					-	"
10	"	1.0	-	-	-					-	Abundant forams. Two nuclei/basalt.
14	Fe/Mn Nodule	-	-	-	-					-	Elongated. Numerous inclusions.
(16 - 18)	Fe/Mn Crust	-	-	-	-					-	-
(19 - 32)	Fe/Mn Nodules	-	-	-	-					-	-
34	Erratics	1.6	F	Fine grained sedimentary.	-					-	-
39	"	-	-	Metasediment.	-					-	7 pieces.
43	Volcanic Erratics	4.5	-	-	-					-	2 pieces. Forams noted.
44	Erratics	-	-	Metasediment.	-					-	-
46	Sediment	-	-	-	-					-	3 types.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/S. Humphris DATE 8/30/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(2 - 11)	Fe/Mn Crust	19 tot.	-	-	-	-	-	-	-	-	Many pieces of various size.
12	Granitic Erratic	3.5	-	-	-	-	-	-	-	-	Fragments.
13	"	2.5	-	-	-	-	-	-	-	-	-
14	"	2.7	-	-	-	-	-	-	-	-	-
15	"	3.2	-	-	-	-	-	-	-	-	-
16	"	4.7	-	-	-	-	-	-	-	-	1 boulder.
(17 - 43)	Various Erratics	79.0	-	-	-	-	-	-	-	-	~100 rocks.
44	Igneous Erratic	11.5	C	-	-	-	-	-	-	-	Large boulder.
45	Igneous Erratic	13.5	C	-	-	-	-	-	-	-	-
49	Fe/Mn Crust	1.1	-	-	-	-	-	-	-	-	3 pieces.
50	Fe/Mn Crust	1.1	-	-	-	-	-	-	-	-	2 pieces.
51	Fe/Mn Nodule	2.3	-	-	-	-	-	-	-	-	-
(52 - 56)	Fe/Mn Crust	6.8	-	-	-	-	-	-	-	-	5 separate pieces.
62	Basalt	1.0	-	-	Feldspar+Hb.	-		-	H	Phenocrysts are weathered.	3 pieces.
63	"	0.5	M	-	Weathered Fs.	20%	-	-	M	-	2 pieces.
64	"	0.5	F	-	Fine Hb.	-	-	-	F	-	-
65	Fe/Mn Nodules	0.3	-	-	-	-	-	-		-	-
67	Granitic Erratic	10.5	F	Crystalline.	-	-	-	-		-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/S. Humphris DATE 8/30/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
68	Granitic Erratic	12.0	C	-	-					-	Boulder.
69 - 74	Coral & Sponges	∿	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 8 DREDGE 8 DESCRIBED BY G. Thompson/S. Humphris DATE 8/31/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Schistose meta-sediment	12.0	-	Micaceous	-	—	—	—	—	-	Erratic block.
2	Metamorphosed Volcanic block	13.0	-	-	-	—	—	—	—	-	Rounded erratic.
3	Igneous erratic	12.5	M	-	-	—	—	—	—	-	-
4	Calc Ooze	9.0	-	-	-	—	—	—	—	-	Lithified.
7	Granitic erratics	2.3	-	-	-	—	—	—	—	-	5 pieces.
(8 - 14)	Fe/Mn crust and nodules	8.0	-	-	-	—	—	—	—	-	∿40 pieces.
15	Igneous erratics	3.2	-	-	-	—	—	—	—	-	6 pieces.
(17, 18)	Fe/Mn crust and nodules	2.0	-	-	-	—	—	—	—	-	∿35 pieces.
19	Glauconite?	0.7	-	-	-	—	—	—	—	-	4 pieces/erratics.
(20 - 29)	Various erratics	∿18.0	-	Metamorphic, chloritic and igneous	-	—	—	—	—	-	∿50 pieces.
(30 - 32)	Fe/Mn crusts and nodules	7.7	-	-	-	—	—	—	—	-	17 pieces.
(37 - 41)	Fe/Mn Nodules	4.0	-	-	-	—	—	—	—	-	5 large nodules.
42	Basalt	1.5	A	-	A few Fs, weathered.	20%	10	-	H	-	-
43	"	0.9	A	-	Small Fs-TR.	—	—	—	M	-	-
44	"	0.5	A	-	10% Fs (we.)/ TR-hb.	25%	—	—	F	-	-
46	"	0.7	A	-	-	25%	—	—	H	-	8 pieces.
(49 - 51)	"	4.1	A	-	-	—	—	—	H	-	14 pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 8 DREDGE 8 DESCRIBED BY G. Thompson/S. Humphris DATE 8/31/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(52 - 54)	Granitic erratics	6.8	-	-	-	-	-	-	-	-	Many pieces.
(55 - 68)	Various erratics	28.5	-	Metamorphic, igneous, meta-sediments.	-	-	-	-	-	-	Numerous pieces.
(71 - 76)	Various erratics	12.0	-	-	-	-	-	-	-	-	-
78	Coral	-	-	-	-	-	-	-	-	-	-
79	Lithified sediment	-	-	-	-	-	-	-	-	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 9 DREDGE 9 DESCRIBED BY G. Thompson/S. Humphris DATE 9/1/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Igneous erratic	12.0	C	-	-					-	Boulder.
2	"	13.5	C	-	-					-	Well rounded boulder.
3	"	12.5	M	-	-					-	"
4	Fe/Mn Crust	>13	-	-	-					-	Possibly a basaltic nucleus.
(5, 6, 7)	Fe/Mn Crusts	>14 ea.	-	-	-					-	3 huge crusts.
10	Sediment	1.8	F	-	-					-	Lithified, yellow.
(11 - 25)	Fe/Mn Nodules	~34 tot.	-	-	-					-	Numerous samples.
(26 - 44)	Fe/Mn Crusts	~42 tot.	-	-	-					-	"
(45 - 49)	Fe/Mn Nodule	3.4 tot.	-	-	-					-	4 large nodules.
(50 - 58)	Erratics	19 tot.	-	Metasediments, igneous, metamorphic.	-					-	Numerous pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 10 DREDGE 10 DESCRIBED BY G. Thompson/S. Humphris DATE 9/1/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Fe/Mn Crust	5.4	-		-					-	2-3cm thick.
2	"	8.5	-	-	-					-	10cm thick.
3	"	2.7	-	-	-					-	5-10mm thick coral holdfas
4	"	11.5	-	-	-					-	Massive.
(5 - 32)	"	~45 tot.	-	-	-					-	Many pieces of assorted sizes and thicknesses.
33	Basalt	1.4	-	-	Small altered Fs.			1		Attached breccia.	-
34	Porphyritic Basalt	0.4	-	-	Altered Fs and hnbl.			5		Veining with white mineral.	-
35	Basalt	0.2	-	-	Weathered Fs.					-	Porphyritic.
36	Basalt Breccia	0.2	-	-	-			5	H	-	-
(37, 38)	Erratics	1.0	-	-	-					-	-
39	Coral	1.3	-	-	-					Fe/Mn staining.	-
(40-44)	"	-	-	-	-					-	-
45	Coral branches and brittle star	-	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 11 DREDGE 11 DESCRIBED BY G. Thompson/S. Humphris DATE 9/1/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Felsic igneous erratic	3.6	M	-	-					-	-
(2 - 4)	Igneous Erratics	7.7	M-C	-	-					-	10 pieces.
5	Quartzose meta-sediment	2.3	-	-	-					-	-
12	Limestone conglomerate	3.2	-	-	-					-	contains lithic fragments.
13	Limestone	1.8	-	-	-					"Vesicular".	Bioclastic fragments.
(14, 15)	Limestone conglomerate	∿12	-	-	-					"	-
(16, 17)	Fe/Mn Crust	∿ 8	-	-	-					-	-
18	Mafic igneous erratic	∿25	M-C	-	-					-	-
19	Felsic igneous erratic	∿25	M-C	-	-					-	Angular.
21	"	14	M-C	-	-			TR	-	-	Rounded.
22	Quartzose sediment	∿ 9	F	-	-					Lithified.	-
23	Limestone conglomerate	7.7	-	-	-					-	A few lithic fragments.
24	Calc Ooze	1.6	-	-	-			15	-	Lithified.	-
(25 - 32)	Fe/Mn Crust	15	-	-	-					-	Many pieces of various sizes.
(33, 34)	Calc Ooze	5.4	-	-	-			10	-	Lithified.	-
(39 - 51)	Fe/Mn Crust	∿18	-	-	-					Slightly lithified.	Many pieces of various sizes.
(52, 53, 54)	Calc Ooze	6.3	-	-	-					-	Coral and shell fragments included.
(55 - 64)	Limestone bioclastic conglomerates	∿25	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 11 DREDGE 11 DESCRIBED BY G. Thompson/S. Humphris DATE 9/1/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(65 - 70)	Limestone	13	M-F	-	-					Well lithified.	Mostly "vesicular".
72	Coral limestone breccia	2	-	-	-					-	-
74	Sponge spicules	-	-	-	-					-	-
75	Coral (branching)	-	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 12 DREDGE 12 DESCRIBED BY G. Thompson/S. Humphris DATE 9/2/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2	Basalt	3.8	A	-	Altered Fs.				L	-	Attached to breccia.
3	Volcanic breccia	3.5	-	-	-				M	-	Lithified matrix.
4	Carbonate Ooze	4.5	-	-	-			10	-	-	-
5	Coccolith Ooze	7.2	-	-	-			100	-	-	Nodular surface.
6	Carbonate Ooze	8.5	-	-	-					-	Lithified and pitted.
7	"	6.5	-	-	-			20	-	-	Large pits.
(8 - 20)	"	26.5	-	-	-					Various thicknesses of Mn and pitting.	Numerous large and small pieces.
(21 - 31)	Carbonate Ooze	~17	-	-	-					Variable thickness of Mn.	Numerous pieces.
32	Metamorphosed sediment	4.0	-	-	-					-	Erratic.
34	Basalt	-	-	-	Altered Fs/hb.					-	Porphyritic.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 13 DREDGE 13 DESCRIBED BY G. Thompson/S. Humphris DATE 9/2/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Igneous Erratic	~45	C	(Felsic)	-	—	—	—	—	-	Subrounded boulder.
2	Fe/Mn Crust	6.0	-	-	-	—	—	—	—	-	10 cm thick.
(3 - 5)	Fe/Mn Crust	14.5	-	-	-	—	—	—	—	-	3 pieces 5cm thick.
(6 - 26)	Fe/Mn Nodules	~45	-	-	-	—	—	—	—	-	Numerous nodules of various sizes.
(27 - 47)	Fe/Mn Crust	~57	-	-	-	—	—	—	—	-	Many pieces of crust of various thicknesses.
(48 - 50)	Calc Ooze	7.0	-	-	-	—	—	5 mm	-	Lithified.	Various pieces.
51	Limestone	1.7	-	-	-	—	—	—	—	Conglomerate.	-
52	Calc Ooze	0.8	-	-	-	—	—	—	—	Partially lithified.	-
53	Fe/Mn Crust	0.7	-	-	-	—	—	—	—	-	-
54	Basalt	3.2	F	-	Angular amphibole (numerous) + Pg.	—	—	—	M	-	Rounded.
55	Basalt	0.4	F	-	Angular amphibole (numerous) + Pg.	10%	—	—	M	-	Vesicles filled with white mineral.
56	Basalt	1.1	F	-	Weathered Pg + fresh Hnbl.	30%	X	-	H	-	-
(57, 58)	"	1.0	F	-	Pg + amphibole.	10%	—	—	M	-	Two rocks.
60	"	0.3	F	-	Pg + Hnbl.	15%	—	—	—	-	-
61	"	0.7	F	-	Fs (altered) + Hnbl.	20%	—	—	M	-	-
(62 - 64)	"	0.9	F		Hnbl. + Fs.	—	—	—	H	Reddish-brown groundmass.	All highly altered.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 14 DREDGE 14 DESCRIBED BY G. Thompson/S. Humphris DATE 9/3/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Fe/Mn Crust	~12	-	-	-					-	10 cm thick.
2	"	~10	-	-	-					-	2 pieces-10 cm thick.
3	Granite	~25	-	-	-					-	Huge boulder.
11	Fe/Mn Crust	1.1	-	-	-					-	2 cm thick.
12	Calc Ooze	0.5	-	-	-					Lithified.	-
13	Volc. Breccia	1.0	-	-	-					Lithified ooze.	-
14	Metasediment	2.7	-	Quartzose.	-					-	Erratic.
16	Volc. Breccia	1.6	-	-	-					With lithified ooze.	-
18	Basalt	0.45	V.F.	-	-			10		-	Attached to breccia (volc.
19	"	0.9	V.F.	-	-			1.0	-	-	-
20	"	2.3	V.F.	-	Altered Fs, TR-hnbl.					-	-
21	Volc. Breccia	1.9	M	-	-					With lithified ooze.	-
22	Basalt	-	F	-	-					-	Angular pebbles.
23	Fe/Mn Crust	1.4	-	-	-					-	-
24	Coral	-	-	-	-			5	-	-	Branching.
27	Diabase	1.6	-	-	-					-	Erratic.
28	Gneiss	1.6	-	-	-					-	"
29	Basalt	3.0	F	-	1.2mm Pg (anhedral).				F	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 14 DREDGE 14 DESCRIBED BY G. Thompson/S. Humphris DATE 9/3/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
30	Calc Ooze	2.2	F	-	-					Lithified.	-
31	Basalt	1.6	A	-	-				rind	-	-
32	Gneiss	1.0	-	-	Feldspar rich.					-	Erratic (2).
34	Basalt	1.8	A	-	-				F	-	Crust of calc ooze.
35	"	1.1	F	-	Weathered Pg (few).				F	-	-
36	"	0.45	-	-	TR.	35%	15%	-	V.F.	-	-
37	Basalt Breccia	1.6	-	-	-					Calcareous matrix.	Remarkable.
39	Calc Ooze	1.4	-	-	-					-	3 pieces.
40	Basalt Breccia	0.5	-	-	-					With lithified calc ooze.	Basalt is vesicular.
45	Basalt	0.5	V.F.	-	-				M	-	-
46	"	0,2	V.F.	-	TR-fs + hnbl.				M+	-	-
47	"	0.5	-	-	-				M	-	Thin calc-crust.
55	"	1.4	F	-	-				H	-	Encrusted with calc-breccia.
57	"	0.5	-	-	-				M	-	Aphyric.
62	Erratics	1.4	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson/S. Humphris DATE 9/6/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	2.5	-	-	-	—		>20	-	-	Calc ooze. Bag of pebbles.
2	Fe/Mn Crust	∿20	-	-	-	—	—	—	—	-	Many large pieces.
5	Basalt	3.4	F	-	Hnbl. (fresh)	—	—		F	-	-
6	"	1.1	A	-	-	25%	—	—	—	-	-
7	Volc. Basalt	3.3	F	-	Pg + Fe/Mg xen.	-	20%	—		-	-
8	Basalt	1.2	A	-	-	—	—	—	—	-	Porphyritic.
9	Volc. Basalt	1.6	F	-	Pg + Fe/Mg	—		5	-	-	-
10	Basalt	3.4	A	-	-	—	—	—	—	-	Porphyritic.
11	"	1.7	A	-	-	—	—	—	—	-	-
12	Basalt Breccia	0.5	-	-	-	—	—	—	—	-	Volcaniclastic matrix.
13	"	1.1	-	-	Pg, hnbl-fresh.	—	—	—	—	-	Angular fragments.
(14 - 18)	Mn nodules and Crust	1.0	-	-	-	—	—	—	—	-	-
22	Basalt	∿18	A-F	-	-	—	—	—	—	-	Bag of small pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 17 DREDGE 17 DESCRIBED BY G. Thompson/S. Humphris DATE 9/6/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 3)	Fe/Mn Crust	~30	-	-	-	-	-	-	-	5-10 cm thick.	Numerous pieces.
4	Basalt	15	A	-	-	many filled	-	50	-	Highly altered.	Very crumbly.
5	"	15	A	-	-	"	-	50	-	"	"
6	Fe/Mn Crust	12	-	-	-	-	-	-	-	-	No attached sediment. 5 cm thick.
7	Basalt	15	A	-	-	many filled	-	50	-	Highly altered.	Very crumbly.
9	$CaCO_3$ Sediment	-	-	-	-	-	-	0.5	-	-	Lithified.
(10 - 12)	Fe/Mn Crust	-	-	-	-	-	-	-	-	-	Many fragments stored in cans.
16	Basalt	22	A	-	Altered Pg.	filled common	-	10	-	(5 pieces).	Scattered megacrysts of hb.
17	Breccia	4.0	-	-	-	-	-	-	-	Altered basalt in calcitic	Reddish brown.
										matrix.	
18	Basalt	2.0	F	-	Altered Pg.	-	-	10	-	Highly altered.	-
20	"	1.1	-	Large aggregates (1cm)	-	Lg. un-	-	-	-	Altered.	-
				of Hnbl.		filled					
29	Volcaniclastic Sediment	1.5	-	-	-	-	-	-	-	-	Slightly lithified.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/S. Humphris DATE 9/6/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	1.0	A	-	-	10%				-	-
2	"	2.0	A	-	-	10%				-	-
3	"	2.0	A	-	-	8%				-	-
4	"	3.2	A	-	-	10%				-	-
6	Fe/Mn Crust	-	-	-	-					-	Bag.
7	Calc Ooze/Mn	-	-	-	-					-	Bag.
8	Volcaniclastic Breccia	-	-	-	-					-	Bag.
13	Basalt	-	-	-	-			10	H	-	Bag.
20	Pillow Basalt	-	A	-	-			10	-	-	2 pieces.
23	Mollusc	-	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 19 DREDGE 19 DESCRIBED BY G. Thompson/S. Humphris DATE 9/7/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Coral	-	-	-	-			TR	-	-	Sponge.
2	Fe/Mn Crust	10	-	-	-					-	Bag of fragments.
4	"	145	-	-	-			50	-	-	Breccia attached (1cm layer).
5	Breccia	9	-	-	-			30	-	-	Rounded boulder.
6	Basalt Breccia	20	-	-	-			10	-	-	-
8	"	2	C	-	-			TR	-	Some of basalt is fresh.	Calcitic matrix.
10	Fe/Mn Crust	2	-	-	-			3	-	-	Bag of fragments.
11	Basalt	5	F	-	-				VH	Highly altered.	-
13	Calc Ooze	1	-	-	-					Lithified.	2 pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 20 DREDGE 20 DESCRIBED BY G. Thompson/S. Humphris DATE 9/8/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Fe/Mn Crust	∿10	-	-	-	-	-	-	-	-	Calc ooze attached.
2	"	-	-	-	-	-	-	-	-	-	-
3	"	-	-	-	-	-	-	-	-	-	-
5	Volcaniclastic Breccia	-	-	-	-	-	-	10	-	Palagonite rind.	-
6	Basalt	-	A	-	-	-	-	-	H	-	6 pieces.
7	Coral	-	-	-	-	-	-	TR	-	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 21 DREDGE 21 DESCRIBED BY G. Thompson/S. Humphris DATE 9/19/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Sponge	-	-	-	-					-	Fresh (frozen).
2	Calc Ooze	-	-	-	-			TR	-	Lithified.	-
3	Aphyric weathered basalt	1/2	A	-	-				H	-	-
4	"	1/2	A	-	-				H	-	-
(5, 6)	"	1	A	-	-				H	-	-
7	Calc ooze with Mn Crust	>20	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 22 DREDGE 22 DESCRIBED BY G. Thompson/S. Humphris DATE 9/11/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Fe/Mn Crust	-	-	-	-	-	-	-	-	-	Many pieces.
2	Fe/Mn Crust	-	-	-	-	-	-	-	-	-	Calc ooze attached.
4	Coral	-	-	-	-	-	-	TR	-	-	-
5	Fe/Mn Crust	-	-	-	-	-	-	-	-	-	Calc ooze attached. Numerous pieces.

WHOI ROCK SAMPLE DESCRIPTION

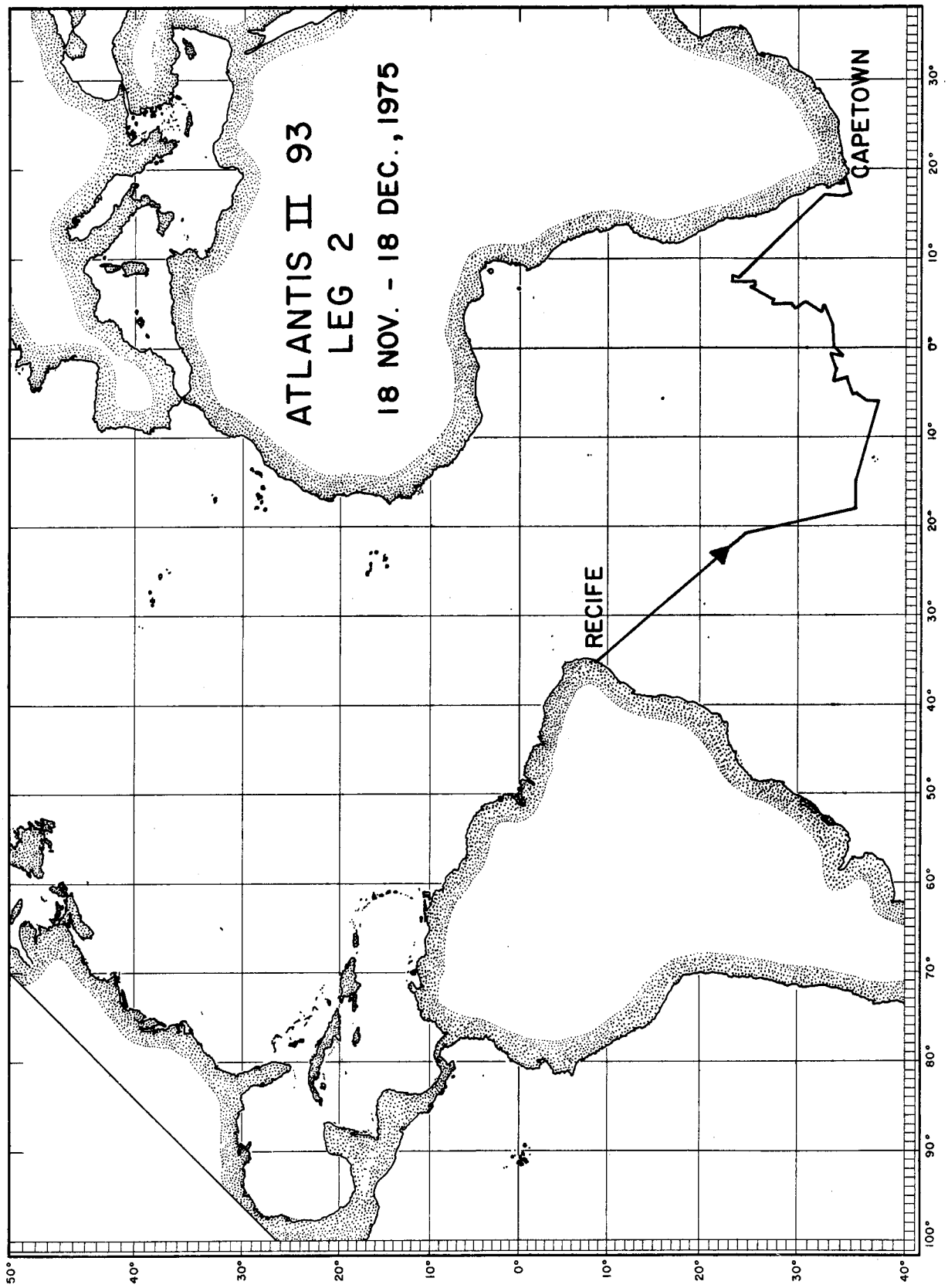
CRUISE AII 85 STATION 23 DREDGE 23 DESCRIBED BY G. Thompson/S. Humphris DATE 9/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Glauconite Breccia	1/2	C-A	-	-	—	—	—	—	-	Small angular fragments of basalt.
2	Porphyritic Basalt	2.5	A	-	Weathered Pg.	10%	—	—	—	-	-
3	Volcaniclastic Sediment	1.5	-	-	-	—	—	—	—	-	Homogeneous/granular textur
4	Basalt Breccia	1.0	-	-	Biotite + hb.	—	—	—	—	-	Angular fragments.
6	Fe/Mn Crust	-	-	-	-	—	—	—	—	-	Attached to sedimentary breccia.
7	Basalt	-	A	-	-	M	—	—	H	-	Bags of fragments.
8	"	-	A	-	-	30%	—	—	VH	-	"
10	Fe/Mn Crust	-	-	-	-	—	—	—	—	-	Bag.
12	Calc Ooze	-	-	-	-	—	—	—	—	Mn crusts attached.	Contains volcanic fragments
13	"	-	-	-	-	—	—	—	—	"	"
14	Basalt	-	-	-	-	—	—	—	VH	-	Bag of pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 85 STATION 24 DREDGE 24 DESCRIBED BY G. Thompson/S. Humphris DATE 9/12/74

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Calc Ooze	-	-	-	-					-	Bag.
2	"	-	-	-	-					-	Bag.
3	Mn Crust	-	-	-	-						In bag. With sediment attached.
4	"	-	-	-	-					-	Bag.
5	Calc Ooze	-	-	-	-					-	Worm tubes.
6	"	-	-	-	-					-	Bag.
7	Mn Crust	-	-	-	-					-	With sediment attached.
8	"	-	-	-	-					-	-
10	Calc Ooze	-	-	-	-					Lithified.	-


ATLANTIS II 93
LEG 2
18 NOV. - 18 DEC., 1975
RECIFE
CAPETOWN
50°
40°
30°
20°
10°
0°
10°
20°
30°
40°
50°
60°
70°
80°
90°
100°

********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
AII	93	2	0001	0000	8	751128	34 59.0'S	16 8.0'W	9	409.46	0001	3576.	2283.	015K	15	0000	0	
AII	93	2	0003	0000	8	7512 1	37 8.3'S	7 49.5'W	9	408.77	0003	2650.	1940.	034K	15	0000	0	
AII	93	2	0004	0000	8	7512 1	36 22.7'S	7 30.7'W	9	408.67	0004	2184.	1925.	013K	15	0000	0	
AII	93	2	0005	0000	8	7512 3	34 17.3'S	5 2.1'W	9	408.45	0005	3101.	3012.	051K	15	0000	0	
AII	93	2	0006	0000	8	7512 3	34 21.0'S	4 59.0'W	9	408.44	0006	2460.	2360.	037K	15	0000	0	
AII	93	2	0007	0000	8	7512 4	34 30.0'S	3 27.9'W	9	408.43	0007	2220.	2130.	001K	15	0000	0	
AII	93	2	0008	0000	8	7512 4	34 30.0'S	3 28.4'W	9	408.43	0008	1984.	1488.	058K	15	0000	0	
AII	93	2	0009	0000	8	7512 5	34 10.6'S	1 29.7'W	9	408.41	0009	1925.	1765.	022K	15	0000	0	
AII	93	2	0010	0000	8	7512 5	34 20.5'S	1 34.6'W	9	408.41	0010	2284.	1935.	056K	15	0000	0	
AII	93	2	0011	0000	8	7512 6	32 58.2'S	0 1.1'W	9	408.41	0011	3109.	2367.	088K	15	0000	0	
AII	93	2	0012	0000	8	7512 7	32 39.9'S	1 35.3'E	9	443.20	0012	3090.	2827.	001K	15	0000	0	
AII	93	2	0013	0000	8	7512 7	32 39.1'S	1 36.0'E	9	443.21	0013	2307.	2215.	014K	15	0000	0	
AII	93	2	0014	0000	8	7512 8	31 59.5'S	2 24.2'E	9	443.12	0014	2304.	1587.	175K	15	0000	0	
AII	93	2	0017	0000	8	751210	29 32.8'S	3 5.7'E	9	407.93	0017	2787.	1850.	072K	15	0000	0	
AII	93	2	0019	0000	8	751212	26 28.7'S	6 15.3'E	9	407.66	0019	2450.	2400.	033K	15	0000	0	
AII	93	2	0020	0000	8	751213	24 43.2'S	6 34.2'E	9	407.46	0020	1800.	1190.	035K	15	0000	0	
AII	93	2	0021	0000	8	751214	25 26.0'S	6 42.2'E	9	407.56	0021	3160.	2625.	004K	15	0000	0	
AII	93	6	0011	0000	8	76 317	24 58.8'S	70 0.7'E	9	400.40	0010	3512.	3522.	104K	16	0000	0	
AII	93	6	0012	0000	8	76 317	24 40.5'S	70 2.7'E	9	400.50	0011	3445.	3323.	043K	14	0000	0	
AII	93	6	0014	0000	8	76 328	25 42.6'S	69 33.5'E	9	401.59	0013	3609.	3256.	086K	14	0000	0	
AII	93	6	0015	0000	8	76 328	25 46.8'S	70 11.0'E	9	400.50	0014	3521.	3097.	024K	16	0000	0	
AII	93	6	0018	0000	8	76 330	25 35.5'S	69 55.8'E	9	401.59	0016	3865.	3079.	040K	16	0000	0	
AII	93	12	0044	0000	8	76 919	5 20.6'S	131 54.4'E	2	322.51	0018	1551.	695.	500G	3	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 1 DREDGE 1 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 11/28/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	10.0	A	-	Zeolitic amygdules.	3%	TR	X	M	Altered glass.	Large boulder, vesicular, 2 cm glassy margin.
2	Breccia	0.2	C	Cemented with carbonate?	-	TR	-	5	M	-	Mn crust.
3	Basalt	0.5	A	-	Pg - TR	1%	-	5	M	-	Vesicular. Mn crust.
4	Mn Crust	0.1	-	-	-	——	——	20	-	-	(From 1-1?)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 3 DREDGE 3 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/1/75

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Breccia	17.0	C	-	TR-Pg in some clasts.	TR	TR	2	M	Altered basalt clasts.	Notable Mn-crust. Some clasts >10cm.
2	Conglomerate	0.4	C	$CaCO_3$ cement?	Pg, qtz (?).	—	—	—	L	-	Pebbles, sand and shells cemented together.
3	"	0.2	C	-	-	—	—	1-2	M	-	Thin Mn crust. Shell and pebble clasts.
(4 - 5)	"	0.5 tot.	M	zeolite cement (?).	Pg, qtz (?).	—	—	—	M	-	Shell and pebble clasts. (2 samples total).
(6 - 8)	"	1.4 tot.	M	zeolite cement (?).	-	—	—	1-2	M	-	3 samples total. Shell and pebble clasts.
9	"	0.7	C	$CaCO_3$ cement prominent.	-	—	—	—	M	-	Shell and pebble clasts.
(10 - 11)	"	0.3 tot.	M	-	-	—	—	1-2	M	-	Thin Mn crust (2 samples total).
12	"	0.5	M	$CaCO_3$ cement prominent.	-	—	—	1-2	L	-	Thin Mn crust.
(13 - 14)	"	0.5 tot.	C	zeolite cement?	-	—	—	1-2	M	-	2 samples total. Thin Mn crust. Shell and pebble clasts.
(15 - 17)	Conglomerate	0.5 tot.	C	zeolite cement?	-	—	—	—	M	-	3 samples total. Shell and pebble clasts.
18	"	0.1	C	$CaCO_3$ cement.	-	—	—	1-2	M	-	Shell and pebble clasts.
(19 - 20)	"	7.0 tot.	C	"	TR-Pg in some clasts.	—	—	1-2	H	-	Thin Mn crust. (2 samples total).
21	Breccia	2.0	C	-	Pg - abundant.	1%	TR	-	M	-	Carbonate in matrix-veins?
22	"	1.8	C	$CaCO_3$ cement.	Pg - TR.	—	—	1-2	M	-	Thin Mn crust. Alteration rim noted.
(23 - 25)	"	3.4	C	-	10% Pg xtals in some clasts.	1%	TR	1-4	M	-	Vesicular. Thin Mn crust. (3 samples total).
(26 - 29)	Sandstone	1.6 tot.	F	$CaCO_3$ cement.	Basalt fragments.	—	—	1-2	M	-	(4 samples total). Poorly sorted, porous.
30	Mn Crust	0.2	-	-	-	—	—	—	M	-	Botryoidal, with attached breccia.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 3 DREDGE 3 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/1/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
31	Assorted Sample	0.1	-	-	-					-	Like sample #3-(2-5).
		STATION	4	DREDGE	4						DATE 12/1/75
1	Basalt fragment	2.0	A	-	-	TR	-	5-40	H	-	Botryoidal Mn-crust, very thick.
2	Mn Crust	2.0	-	-	-			60	H	-	High altered basalt fragments cemented by carbonate, forms nucleation surface.
3	Mn crust	0.5	-	-	-			1-2	VH	Breccia layer very highly altered.	Like sample No. 2.
4	Breccia	0.2	C	-	-			1	H	Highly altered basalt fragments.	-
5	Breccia	5.0	C		Vesicular, aphyric basalt clasts noted.	TR	-	40	H	Highly altered basalt fragments in carbonate matrix.	-
6	Mn crust	1.0	-	-	-			X	-	-	Small amount of sediment attached. Botryoidal surface.
7	Mn crust	0.4	-	-	-			X	-	-	Small amount of sediment attached. Botryoidal surface.
8	Mn crust	0.2	-	-	-			X	-	-	Sediment on upper surface.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 4 DREDGE 4 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/1/75

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(9 - 12)	Mn crust	0.2	-	-	-	——		X	-	-	4 samples total. Small amount of sediment attached
											Botryoidal surface.
13	Coral	0.5	-	-	-	——		20-40	-	-	White branching coral with Mn coating.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 5 DREDGE 5 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/3/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Sediment	17.0	-	-	-	—	—	10	-	-	Light to reddish mud encrusted in Mn.
2	"	7.0	-	-	-	—	—	15	-	-	Encrusted in Mn. Botryoidal Mn.
3	Breccia	11.0	C	Carbonate (?) cement.	(In some basalt clasts) 5% - Pg.	2%	TR	7.5	M	-	Breccia encrusted in botryoidal Mn. Rounded/
											weathered fragments.
4	Breccia	4.0	C	Carbonate (?) cement.	(In basalt clasts) 1%-Pg.	1%	TR	5.0	M	-	Breccia encrusted in botryoidal Mn. Rounded/
											weathered fragments.
5	Mn crust	4.0	-	-	-	—	—	60	-	-	Botryoidal Mn. Layering apparent.
6	Breccia	2.1	C	Carbonate (?) cement.	(In some basalt clasts) 4%-Pg.	1%	TR	3.0	M	-	Breccia encrusted with botryoidal Mn.
(7 - 12)	Sediment	5.5 tot.	-	-	-	—	—	10	-	-	Mud encrusted in Mn. Botryoidal Mn. 6 samples.
(13 - 15)	"	0.6 tot.	-	-	-	—	—	TR	-		3 samples total. Mud encrusted in Mn.
(16 - 17)	Mn crust	0.5 tot.	-	-	-	—	—		-	-	2 samples total. Small amount of sediment attached
											Botryoidal Mn.
18	Coral	-	-	-	-	—	—	—	—	-	Small piece (18cm x 3cm).
19	Sponge	-	-	-	-	—	—	—	—	-	Small piece.
(20 - 22)	Coral	-	-	-	-	—	—	—	—	-	3 samples total.
23	Bryozoa (?)	-	-	-	-	—	—	—	—	-	Small branched sedentary colony.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 6 DREDGE 6 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/3/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Breccia	14.0	C	Carbonate? cement.	In some basalt clasts, TR - Pg.	TR	A	70-80	H	Weathered clasts.	Botryoidal - Mn crust. Clasts exhibit alteration rims.
					Mostly zeolitic amygdules.						
2	Sediment	11.0	-	-	-	—	—	30-40	-	-	Botryoidal - Mn crusting.
3	"	1.5	-	-	-	—	—	10-20	-	-	Mn crusting on brown sediment.
4	Mn Crust	3.0	-	-	-	—	—	10	-	-	Botryoidal - Mn.
5	Sediment	2.0	-	-	-	—	—	10	-	-	Botryoidal - Mn crusting. $CaCO_3$ veins.
6	Mn Crust	1.0	-	-	-	—	—	60-70	-	-	Botryoidal - Mn.
7	Breccia	1.0	M	-	-	—	—	20	H	-	Botryoidal - Mn crusting on weathered breccia.
8	Mn Crust	1.0	-	-	-	—	—	10	-	-	Botryoidal - Mn. Layer of breccia/sediment noted.
9	"	0.8		-	-	—	—	30	-	-	Botryoidal - Mn. Nucleating on sediment.
(10 - 12)	"	1.2 tot.	-	-	-	—	—		-	-	Botryoidal - Mn. 3 samples total. Nucleating on sediment.
13	Mn Crust	0.4	-	-	-	—	—		-	-	Botryoidal - Mn. Nucleating on sediment.
14	Mn Crust	0.4	-	-	-	—	—		-	-	Botryoidal - Mn. Assorted small pieces.
15	Basalt	0.3	C	-	Trace of phenocrysts.	TR	TR	10	M	-	-
		STATION:		7	DREDGE: 7						DATE: 12/4/75
1	Breccia	0.4	C	-	Olivine - TR. Pg - rich.	—		10	M	-	Fragments of fairly fresh basalt, mostly Mn crust remains.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 8 DREDGE 8 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/4/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Mn Crust	12.0	-	-	-			60	L	-	$CaCO_3$ veins, and botryoidal Mn.
2	Consolidated Sediment	7.0	F	-	-			10-20	H	-	Greenish - buff sandstone, layering evident.
(3 - 4)	"	-	M	$CaCO_3$ cement?	-			TR	H	-	Greenish - buff sandstone and conglomerate. Shell clasts. 2 samples total.
5	Mn Crust	2.5	-	-	-			25	-	-	Botryoidal.
(6 - 9)	Layered calc. sandstone	6.0 tot.	F	-	-			15	L	semi-lithified.	Cobble of layered sedimentary rock (4 samples total).
10	Calc. sandstone	0.2	M	-	-				L	"	(Ash?) grains causing yellowish-green color.
11	Breccia	1.5	C	-	TR-Pg and Ol noted in basalt clasts.			0.5	M	-	Botryoidal Mn - crust.
12	Layered calc. sandstone	1.2	M	-	-			15	L	semi-lithified.	Cobble of sedimentary rock, two layers present.
13	Mn Crust	1.1	-	-	-			15	-	-	Botryoidal Mn - crust.
14	Layered calc. sandstone	1.0	M	-	-			TR	L	semi-lithified.	Cobble of sedimentary rock, two layers present.
15	Breccia	0.8	C	$CaCO_3$ cement?	TR-Pg in basalt clasts.			0.5	M	-	Altered basalt fragments.
(16 - 17)	Layered calc. sandstone	1.4 tot.	M	-	-			TR	L	semi-lithified.	2 samples total. Cobble of sedimentary rock, two layers present.
18	Mn Crust	0.6	-	-	-			15	-	-	Piece of crust with basalt fragments forming nucleation sites.
19	Layered calc. sandstone	0.8	F	"	-			15	L	semi-lithified.	Cobble of sedimentary rock, layering is conspicuous.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 8 DREDGE 8 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/4/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
20	Mn Crust	0.7	-	-	-			30	-	-	Botryoidal surface noted.
(21 - 23)	Layered calc. sandstone	-	F	-	-			TR	L	Semi-lithified	Cobble of sedimentary rock, two layers present.
24	Sediment	1.0	F	-	-					-	Fine grained sediment with pink hue's.
25	Breccia	0.5	C	$CaCO_3$ cement?	Fresh Pg, altered olivine in basalt clasts.				H	-	Highly weathered basalt fragment.
26	Layered calc. sandstone	0.2	F	-	-			15	L	semi-lithified	Small sedimentary rock with two layers.
27	Sediment	0.5	F	-	-			20-40	-	-	Greenish-yellow color, layered, top covered with Mn crust.
28	Mn Crust	0.7	-	-	-			10-20	-	-	Botryoidal - Mn.
29	"	1.0	-	-	-				-	-	Fine layer of ash noted. (6 pieces total.)
30	Sediment	0.7	C	-	-			10-20	-	-	Coarse grained sediment, encrusted in Mn with $CaCO_3$ infilling.
31	Sediment	0.8	-	-	-					-	Ashy sediment (8 pieces).
32	"	0.7	C	-	-			40	-	-	Coarse grained ashy sediment with Mn crust.
33	Mn Crust	0.7	-	-	-			10-20	-	-	Botryoidal Mn - crust.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 9 DREDGE 9 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/5/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Mn Nodule	5.0	-	-	-			20	-	-	$CaCO_3$ nucleus. 2 cm thick Mn crust.
2	Mn Pavement	4.0	-	-	-			50	-	-	Botryoidal Mn surface. Coral on outer surface.
3	Mn Nodule	1.0	-	Carbonate matrix.	Clasts are aphric basalt.			20	-	-	Breccia nucleus with fragments of basalt.
4	"	2.0	-	-	-			10	-	-	Sediment nucleus. $CaCO_3$ in fillings and Mn crust.
5	"	2.0	-	-	-			10	-	-	Consolidated sediment as nucleus.
6	Mn Crust	1.0	-	Consolidated sediment.	Highly altered basalt clasts.			30	-	-	Breccia nucleus.
7	"	1.0	-	-	-			20	-	-	Coral growing on outer surface.
8	Mn Nodule	1.0	-	-	-			10	-	-	Consolidated sediment as nucleus.
9	Mn Crust	1.0	-	-	-				-	-	Four pieces of crust.
10	"	0.2	-	-	-			30	-	-	Consolidated sediment as nucleus.
11	Mn Nodule	0.2	-	-	-			20	-	-	"
12	Sediment	0.2	-	-	-			TR	-	-	"
13	Mn Nodule	0.2	-	-	-			5	-	-	"
14	Mn Crust	0.1	-	-	-			20	-	-	-
15	Mn Nodule	0.1	-	-	-			5	-	-	Consolidated sediment as nucleus.
16	"	2.2	-	-	-			40	-	-	"

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 10 DREDGE 10 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/5/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 4)	Consolidated Sediment	>25	-	-	-	—		TR	-	-	Carbonate rich sediment. Fe-Mn staining noted.
5	Assorted consolidated sediment fragments.	2.0	-	-	-	—		TR	-	-	Carbonate rich sediment. Fe/Mn stain. (~20 pieces of sediment.)
6	Mn Crust	1.6	-	-	-	—		60	-	-	Pockets of carbonate rich sediment noted.
7	"	1.3	-	-	-	—		40	H	-	Weathered basalt and carbonate nucleus.
8	"	1.0	-	-	-	—			-	-	Very angular.
9	Consolidated Sediment	1.0	-	-	-	—			M	-	Yellow in color.
10	Mn Crust	1.0	-	-	-	—		20	-	-	Worm burrows.
(11 - 17)	Basalt	3.6 tot.	A	-	Weathered. Pg (<1%), Ol.	—		1	M	-	7 samples total. 1 cm weathering rind. Conchoidal fractures, relatively fresh rock.
18	Mn Crust	1.0	-	-	-	—			-	-	Botryoidal, layered - Mn.
19	Mn Nodule	2.0	-	-	-	—			-	-	Nucleus of consolidated sediment.
(20 - 28)	Sediment	7.7 tot.	-	-	-	—		TR	-	-	$CaCO_3$ sediment, worm burrows? Mn-staining. (9 samples total.)
(29 - 33)	Pumice	1.0 tot.	A	-	TR - large Pg grains.	50%	TR	-	L	-	Porous material, glassy fibrous texture. (5 samples total.)
34	Limestone	0.5	A	-	-	X	-	TR	L	-	Mn crusting, chambers noted, burrows?
35	Basalt	0.4	A	-	-	—		1-2	M	Relatively fresh core, 1cm weathering rind.	Greenish weathered material coats sample.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 11 DREDGE 11 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/5/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 7)	Mn Crust	>32 tot.	-	-	-	—	—	60	-	-	(7 samples total.) Mn - crust attached to lithified sediment. Botryoidal surface noted.
8	Basalt	14.0	F	-	Pg + (Ol?) Trace.	TR	-	45	M	-	Large size boulder, gray in color, layered morphology.
9	Mn Crust	4.0	-	-	-	—	—	60	-	-	Mn crust attached to lithified sediment. Botryoidal surface noted.
10	Mn Nodule	1.0	-	-	-	—	—	5	-	-	Botryoidal. Nucleus of consolidated sediment.
11	Sediment	1.0	-	-	-	—	—	10	-	-	Consolidated light-colored sediment.
12	Mn Crust	2.2	-	-	-	—	—	50	-	-	Mn crust attached to lithified sediment. Botryoidal surface noted.
13	Sediment	0.8	F	-	-	—	—	10	-	-	Worm burrows noted.
14	Basaltic Sandstone	3.0	M	$CaCO_3$ matrix?	Pg grains noted.	—	—	5	-	-	Chalky matrix, mostly basalt grains, angular to subangular.
15	Mn Crust	1.0	-	-	-	—	—	50	-	-	Mn crust attached to lithified sediment. Botryoidal Mn.
16	Sediment	1.3	F	-	-	—	—	10	-	-	Worm burrows noted.
17	Mn Crust	0.5	-	-	-	—	—		-	-	Botryoidal surface noted.
(18 - 19)	"	1.4 tot.	-	-	-	—	—	60	-	-	Botryoidal surface - Mn. 0.6 kg each. Mn crust attached to lithified sediment.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 11 DREDGE 11 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/5/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
20	Mn Crust	0.6	-	-	-			10	-	-	Botryoidal surface noted. $CaCO_3$ nucleus.
21	Sediment	0.7	-	-	-			TR	-	-	Consolidated $CaCO_3$.
(22 - 24)	Mn Crust	0.7 tot.	-	-	-			X	-	-	3 samples total. Botryoidal surface.
(25 - 26)	Sediment	0.5 tot.	-	-	-			10	-	-	2 samples total. Consolidated $CaCO_3$. Iron staining noted.
(27 - 28)	Mn Crust	0.9 tot.	-	-	-			60	-	-	2 samples total. Botryoidal surface.
29	Consolidated, brecciated sediment	0.5	C	-	-				M	-	Light brown consolidated sediment with green clasts.
(30 - 32)	Mn Crust	0.7 tot.	-	-	-			X	-	-	3 samples total. Botryoidal surface.
33	Sediment	0.2	F	-	-			10	-	-	Worm burrows noted.
34	Consolidated Sediment	0.2	-	-	-			10	-	-	Iron staining noted. Completely coated with Mn.
35	Sediment	0.2	F	-	-			10	-	-	Worm burrows noted.
36	Consolidated, brecciated sediment	0.2	C	-	-				M	-	Light brown consolidated sediment with green clasts.
37	Mn Crust	0.3	-	-	-			60	-	-	Botryoidal surface.
38	"	0.1	-	-	-			X	-	-	Attached sediment noted.
39	Sediment	0.2	F	-	-			10	-	-	Worm burrows noted.
40	Mn Crust	0.2	-	-	-			50	-	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 11 DREDGE 11 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/5/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
41	Mn Crust	0.2	-	-	-			X	-	-	$CaCO_3$ Nucleus. Botryoidal surface.
42	"	0.2	-	-	-			X	-	-	Botryoidal surface.
43	Sediment	0.2	-	-	-					-	Consolidated $CaCO_3$.
44	Mn Crust	0.1	-	-	-			50	-	-	Botryoidal surface.
45	"	0.7	-	-	-			20	-	-	Mn crust shows layering. $CaCO_3$ infilling.
46	"	0.4	-	-	-			20	-	-	$CaCO_3$ infilling and attached consolidated sediment.
47	Sediment	0.2	-	-	-					-	Consolidated $CaCO_3$ sediment.
48	Fragments	0.1	M	-	-			X	M	-	From bottom of dredge.
49	Sediment	0.5	-	-	-					-	Yellowish stain noted.
50	"	0.1	F	-	-			10	-	-	$CaCO_3$ infilling.
		STATION:		12	DREDGE: 12						DATE: 12/7/75
(1 - 3)	Mn Crust	0.6 tot.	-	-	-			2-4	-	-	3 samples total.
4	Breccia	0.2	M	-	-			5	M	-	Contains weathered basalt clasts.
5	Coral	-	-	-	-			TR	-	-	Mn - stained coral.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 13 DREDGE 13 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/7/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 2)	Carbonate Ooze	>22 tot.	-	-	-	—	—	10	-	-	2 samples total. Consolidated, worm burrows noted.
(3 - 4)	Consolidated Sediment	7.0 tot.	-	-	-	—	—	10	-	-	2 samples total. $CaCO_3$ infillings. Botryoidal crust - Mn.
(5 - 7)	Carbonate Ooze	>24.3 tot.	-	-	-	—	—	10	-	-	3 samples total. Consolidated, worm burrows noted.
(8 - 9)	Mn Pavement	6.6 tot.	-	-	-	—	—	60	-	-	2 samples total. Worm burrows filled with $CaCO_3$.
10	Carbonate Ooze	0.4	-	-	-	—	—	10	-	-	Consolidated. Fe - Mn lined worm burrows.
11	Mn Crust	1.0	-	-	-	—	—	X	-	-	Worm burrows.
12	"	0.7	-	-	-	—	—	80	-	-	Worm burrows with soft $CaCO_3$ nucleus.
13	Carbonate Ooze	2.2	-	-	-	—	—	10	-	-	Worm burrows, consolidated.
14	Sediment	0.6	-	-	-	—	—	10	-	-	Worm burrows, greenish consolidated sediment.
(15 - 17)	Carbonate Ooze	7.5 tot.	-	-	-	—	—	10	-	-	3 samples total. Worm burrows, consolidated.
18	Mn Crust	0.8	-	-	-	—	—	30	-	-	-
19	"	0.7	-	-	-	—	—	40	-	-	Worm burrows noted.
20	Mn Pavement	2.3	-	-	-	—	—	X	-	-	Consolidated sediment forms nucleation sites. Botryoidal character.
21	Mn Crust	0.5	-	-	-	—	—	30	-	-	Worm burrows filled with $CaCO_3$.
22	"	0.5	-	-	-	—	—	20	-	-	4 pieces.
(23 - 24)	Mn Pavement	1.0 tot.	-	-	-	—	—	20-30	-	-	2 samples total. Worm burrows noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 13 DREDGE 13 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/7/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(25 - 26)	Carbonate Ooze	1.8 tot.	-	-	-	——		10	-	-	2 samples composed of 5 pieces. Consolidated, worm burrows noted.
(27 - 35)	Mn Crust	7.5 tot.	-	-	-	——		20-50	-	-	9 samples total. Worm burrows, remnants of coral noted.
36	Sediment	1.4	-	-	-	——		TR	-	-	Consolidated, worm burrows noted.
37	Mn Pavement	3.0	-	-	-	——		30	-	-	$CaCO_3$ ooze filling worm burrows.
38	Sediment	1.5	-	-	-	——		TR	-	-	Reddish brown consolidated sediment with botryoidal Mn-crust.
39	Sediment	1.0	-	-	-	——		10	-	-	Consolidated sediment with worm burrows.
40	Mn Crust	1.0	-	-	-	——		20	-	-	4 pieces.
41	Mn Nodule	3.0	-	-	-	——		20	-	-	Consolidated sediment nucleus.
42	Sediment	0.7	-	-	-	——		5	-	-	Consolidated sediment with worm burrows.
43	Mn Crust	1.0	-	-	-	——		30	-	-	Attached consolidated sediment noted.
44	Mn Pavement	1.0	-	-	-	——		60	-	-	Botryoidal character to Mn. Worm burrows filled with $CaCO_3$.
45	Carbonate Ooze	3.0	-	-	-	——		30	-	-	Consolidated, worm burrows noted.
46	Mn Crust	0.2	-	-	-	——		X	-	-	Worm burrows noted.
47	Sediment	1.0	-	-	-	——				-	Consolidated, with $CaCO_3$ filled worm burrows.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 13 DREDGE 13 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/7/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
48	Sediment	0.8	F	-	-	—	—	1-2	-	-	Dark brown. Worm burrows lined with Fe-Mn.
49	"	0.6	-	-	-	—	—	2-4	-	-	Yellowish carbonate rich sediment. Worm burrows filled with white $CaCO_3$.
50	Mn Nodule	0.7	-	-	-	—	—	10	-	-	Worm burrows noted. Nucleus of consolidated sediment.
51	"	2.0	F	-	-	—	—	10	-	-	Consolidated sediment nucleus.
52	Mn Crust	0.5	-	-	-	—	—	1-2	-	-	-
53	Sediment	0.6	-	-	-	—	—	TR	-	-	Consolidated.
54	Mn Nodule	0.3	-	-	-	—	—	1	-	-	Consolidated sediment nucleus.
55	Sediment	0.8	-	-	-	—	—	1	-	-	Layered/consolidated sediment.
56	Mn Nodule	0.2	-	-	-	—	—	5	-	-	Layered/consolidated sediment nucleus.
57	Mn Crust	2.0	-	-	-	—	—	30	-	-	Botryoidal character. TR-carbonate sediment noted.
58	Sediment	0.4	-	-	-	—	—	10	-	-	Layered consolidated sediment.
59	Mn Nodule	2.0	-	-	-	—	—	5	-	-	Consolidated sediment nucleus.
60	Lithified Sediment	0.4	-	-	-	—	—	20	-	-	Burrows noted.
61	Mn Crust	0.5	-	-	-	—	—	5	-	-	Layer of brownish-orange sediment forms nucleation sites.
(62 - 64)	Sediment	1.4 tot.	-	-	-	—	—	4-10	-	-	3 samples total. Consoli-sediment with burrows.
65	Sediment	0.6	-	-	-	—	—	5	-	-	Infillings of $CaCO_3$ ooze noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 13 DREDGE 13 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/7/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
66	Sediment	0.5	-	-	-			4	-	-	Consolidated sediment with burrows.
67	Lithified Sediment	0.5	-	-	-			10	-	-	Burrows noted.
68	Mn Crust	0.8	-	-	-			30	-	-	"
69	Mn Nodule	2.5	-	-	-			4	-	-	Consolidated sediment nucleus with $CaCO_3$ - ooze infilling.
70	Mn Nodule	1.5	F	-	-			20	-	-	Consolidated sediment nucleus.
71	Sediment	1.0	-	-	-			5	-	-	Consolidated.
(72 - 73)	"	1.0 tot.	-	-	-			2	-	-	2 samples total. Infillings of $CaCO_3$.
74	Mn Nodule	1.0	-	-	-			5	-	-	Consolidated sediment nucleus with infillings of $CaCO_3$.
75	Sediment	0.8	-	-	-			10	-	-	Consolidated.
(76 - 77)	Mn Nodule	1.5 tot.	-	-	-			5	-	-	2 samples total. Consolidated sediment nucleus with infillings of $CaCO_3$.
(78 - 79)	Mn Nodule	0.5 tot.	-	-	-			5	-	-	2 samples total. $CaCO_3$ ooze noted in worm burrows.
(80 - 81)	"	0.7 tot.	-	-	-			5	-	-	2 samples total. Consolidated sediment nucleus with infillings of $CaCO_3$.
82	Coral	-	-	-	-					-	Branched.
83	Starfish	-	-	-	-					-	-
84	Sponges	-	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 14 DREDGE 14 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/8/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	7.0	F	-	Pg - Trace.	X	X	5	L	-	Fresh basalt.
2	Mn Crust	11.0	-	-	-	—		10	-	-	Botryoidal surface noted, layered. TR - white carbonate ooze.
3	Consolidated Sediment	6.0	-	-	-	—		5	-	-	Botryoidal Mn crust, appears layered, burrowing and infilling noted.
4	Sediment	10.0	-	-	-	—		TR	-	-	"
(5 - 8)	Consolidated Sediment	4.3 tot.	-	-	-	—		TR	-	-	4 samples total. Burrows and Mn staining noted.
9	Mn Nodule	1.0	-	-	-	—		3	-	-	Consolidated sediment nucleus. $CaCO_3$ ooze infilling, burrowing.
(10 - 17)	Consolidated Sediment	3.9 tot.	-	-	-	—		5	-	-	8 samples total. Burrows and Mn staining noted.
18	Sediment	0.1	-	-	-	—				-	Carbonate rich.
19	Basalt	2.2	F	-	TR - Pg.	TR	TR	2	M	Altered to brownish color.	-
20	"	0.3	A	-	"	TR	TR	20	M	"	Calcite amygdules.
21	"	1.0	F	-	"	TR	TR	5-15	M	"	Zeolitic amygdules.
22	"	0.9	F	-	"	TR	TR	20	M	"	Rounded, zeolitic amygdules.
23	"	1.0	F	-	"	TR	1%	20	M	"	Rounded cobble, zeolitic amygdules.
24	"	0.3	F	-	1% - Pg.	TR	TR	20	M	"	Rounded cobble, zeolitic amygdules.
25	"	0.3	F	-	TR - Pg.	—		TR	M	"	Weathering rind apparent, zeolitic amygdules.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 14 DREDGE 14 DESCRIBED BY S. Humphris/G. Thompson P. Andrew DATE 12/8/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(26 - 89)	Mn Crust	-	-	-	-	—	—	10	-	-	64 samples total. Botryoidal surface noted, layered.
											TR - white carbonate ooze.
90	Consolidated Sediment	0.7	-	-	-	—	—	TR	-	-	Burrowing and Mn - staining noted.
91	Mn Crust	2.0	-	-	-	—	—	10	-	-	Botryoidal surface. Consolidated sediment noted.
92	Sediment	0.1	-	-	-	—	—	—	—	-	Consolidated.
93	"	1.0	-	-	-	—	—	10	-	-	Botryoidal Mn - crust. Consolidated.
94	Mn Pavement	0.7	-	-	-	—	—	30	-	-	Broken coral fragment noted. Botryoidal.
95	Basalt	1.0	A	-	TR - Pg.	TR	TR	10	M	-	Botryoidal Mn - crust. Attached consolidated sediment.
96	Basalt	3.0	A	-	TR - Pg and Px.	—	—	1-2	M	-	Thick weathering rind noted.
97	Mn Crust	0.2	-	-	-	—	—	10	-	-	Botryoidal crust. Attached consolidated sediment.
(98 - 100)	Mn Nodule	1.4 tot.	-	-	-	—	—	5	-	-	(3 samples total.) Botryoidal outer surface. Consolidated / layered sediment nucleus.
101	Mn Nodule	0.3	-	-	-	—	—	1-2	-	-	Botryoidal rind, consolidated sediment nucleus.
102	"	0.4	-	-	-	—	—	1-2	-	$CaCO_3$ infillings.	"
103	Mn Crust	0.4	-	-	-	—	—	2	-	-	"
104	"	-	-	-	-	—	—	15	-	-	-
(105 - 113)	Consolidated Sediment	2.0	-	-	-	—	—	8	-	$CaCO_3$ infilled burrows.	(9 samples total.) Botryoidal Mn - crust.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 14 DREDGE 14 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/8/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
114	Mn Nodule	0.5	-	-	-			X	-	-	Sediment nucleus. $CaCO_3$ infilling, burrowing.
115	Consolidated Sediment	0.2	-	-	-			5	-	-	Worm burrows noted. Carbonate rich.
116	Mn Nodule	0.5	-	-	-			15	-	-	Botryoidal rind, consolidated sediment nucleus.
117	Mn Crust	0.4	-	-	-			10	-	-	Attached consolidated sediment.
118	"	0.2	-	-	-			10	-	-	"
119	"	0.2	-	-	-			1	-	-	Attached consolidated sediment, $CaCO_3$ rich.
(120 - 122)	Mn Pavement	0.7 tot.	-	-	-			2	-	-	(3 samples total.) Some attached sediment noted.
123	Mn Crust	0.1	-	-	-			20	-	-	-
(124 - 125)	Consolidated Sediment	0.6 tot.	-	-	-			20	-	-	2 samples total.
126	Mn Nodule	0.4	-	-	-			3	-	-	Consolidated sediment nucleus. $CaCO_3$-ooze infilling, burrowing.
127	Mn Pavement	0.2	-	-	-			2	-	-	Some attached sediment.
128	Mn Crust	0.4	-	-	-			10	-	-	"
129	Mn Nodule	0.4	-	-	-			5	-	-	Consolidated sediment nucleus. Worm burrows filled with $CaCO_3$.
130	Mn Crust	0.2	-	-	-			10	-	-	Attached consolidated sediment.
131	Mn Nodule	0.4	-	-	-			10	-	-	Sediment nucleus, $CaCO_3$ infilling, burrowing.
132	Mn Pavement	0.2	-	-	-			25	-	-	Good layering noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 14 DREDGE 14 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/8/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
133	Consolidated Sediment	0.2	-	-	-			5	-	-	Notable Fe-Mn crust.
134	Mn Nodule	0.5	-	-	-			10	-	-	Sediment nucleus, $CaCO_3$ infilling, burrowing.
135	Mn Crust	0.2	-	-	-			10	-	-	Attached consolidated sediment.
136	Consolidated Sediment	0.2	-	-	-			5	-	-	Burrows noted.
137	Mn Nodule	0.4	-	-	-			10	-	-	Sediment nucleus, $CaCO_3$ infilling, burrowing.
138	Mn Crust	0.2	-	-	-			30	-	-	Attached consolidated sediment.
139	Mn Crust	0.2	-	-	-			30	-	-	Broken " nodule?
140	Mn Crust	0.1	-	-	-			30	-	-	-
141	"	0.2	-	-	-			10	-	-	Attached consolidated sediment.
142	"	0.4	-	-	-			30	-	-	"
143	Mn Nodule	2.0	-	-	-			5	-	-	Nucleus of consolidated sediment.
(144 - 145)	Mn Crust	0.2 tot.	-	-	-			10	-	-	(2 samples total.) Attached consolidated sediment.
146	Consolidated Sediment	0.4	-	-	-			5	-	-	Burrows noted.
147	Mn Nodule	0.2	-	-	-			10	-	-	Sediment nucleus, $CaCO_3$ infilling, burrowing.
148	Consolidated Sediment	0.2	-	-	-			5	-	-	Burrows noted.
149	Nodule	0.2	-	-	-			X	-	-	Consolidated sediment nucleus.
150	Consolidated Sediment	0.4	-	-	-			5	-	-	Burrows noted.
151	Mn Pavement	0.1	-	-	-			2	-	-	Some attached sediment.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 14 DREDGE 14 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/8/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
152	Mn Crust	0.1	-	-	-	—		3	-	-	-
153	Consolidated Sediment	0.4	-	-	-	—		5	-	-	Burrows noted.
154	Mn Crust	0.2	-	-	-	—		30	-	-	-
155	Sediment	0.1	-	-	-	—		10	-	-	Consolidated sediment with worm burrows.
156	Mn Pavement	1.0	-	-	-	—		X	-	-	Small pockets of sediment noted.
157	Mn Nodule	0.2	-	-	-	—		3	-	-	Consolidated sediment nucleus, $CaCO_3$ ooze in-
											filling, burrowing.
(158 - 159)	Mn Crust	0.5 tot.	-	-	-	—		40	-	-	2 samples total.
160	Mn Nodule Fragment	0.4	-	-	-	—		10	-	-	Consolidated sediment nucleus.
161	Nodule	0.6	-	-	-	—		5	-	-	Consolidated sediment in core. $CaCO_3$ infillings.
162	Mn Crust	0.2	-	-	-	—		20	-	-	TR attached sediment. 3 small pieces.
163	Sediment	0.2	-	-	-	—		10	-	-	Burrows noted. $CaCO_3$ ooze infilling.
164	"	0.2	-	-	-	—		5	-	-	Consolidated sediment with burrows.
165	Mn Nodule	0.4	-	-	-	—		5	-	-	Consolidated sediment nucleus.
166	Mn Crust	0.2	-	-	-	—		5	-	-	Burrowed sediment attached.
(167 - 170)	Mn Nodule	2.0 tot.	-	-	-	—		5	-	-	4 samples total. Consoli- dated sediment nucleus with
											$CaCO_3$ ooze infillings.
(171 - 172)	Mn Nodule	1.2 tot.	-	-	-	—		5	-	-	2 samples total. Consoli- dated sediment nucleus.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 14 DREDGE 14 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/8/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
173	Mn Nodule	0.5	-	-	-	—		5	-	-	Consolidated sediment nucleus with $CaCO_3$ ooze
											infillings.
174	Mn Nodule	3.0	-	-	-	—		20	-	-	Nucleus of consolidated sediment.
175	Consolidated Sediment	1.0	-	-	-	—		10-20	-	-	Fragmented.
		STATION:		17	DREDGE: 17						DATE: 12/10/75
1	Breccia	22.0	C	-	Aphanitic basalt clasts.	25%	A	TR	H	-	$CaCO_3$ and Fe-Mn cement.
2	Mn Crust	1.0	-	-	-	—		30	-	-	$CaCO_3$ sediment attached.
(3 - 4)	Consolidated carbonate ooze	2.5	-	-	-	—				-	2 samples total.
(5 - 6)	Mn Crust	6.0 tot.	-	-	-	—		50	-	-	2 samples total. 1/2 cm layers of attached consolidated sediment.
7	Mn Crust	6.4	-	-	-	—		X	-	-	Worm burrows. $CaCO_3$ consolidated sediment noted.
8	Consolidated carbonate ooze	1.0	-	-	-	—		TR	-	-	Mn staining.
(9 - 12)	Carbonate ooze	1.0	-	-	-	—		TR	-	-	4 samples total. Burrows noted. Mn-staining of burrows.
13	Mn Crust	0.9	-	-	-	—		10	-	-	Attached sediment noted.
14	Breccia	1.0	C	-	Aphanitic basalt clasts.	TR	TR	10	M	-	Mn and $CaCO_3$ cement.
(15 - 18)	Carbonate Ooze	5.7 tot.	-	-	-	—		TR	-	-	4 samples total. Burrows noted. Mn staining of burrows.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 17 DREDGE 17 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/10/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19	Breccia	0.6	C	-	Aphanitic basalt clasts.	30%	A	10	L	-	Mn and $CaCO_3$ cement. Clasts are highly fractured.
20	Mn Crust	0.7	-	-	-	—	—	X	-	-	Botryoidal crust. Worm burrows noted.
21	Sediment	0.7	-	-	-	—	—	20	-	-	Burrows filled with $CaCO_3$.
22	Mn Crust	0.6	-	-	-	—	—	20	-	-	-
23	Sediment	0.5	-	-	-	—	—	20	-	-	Burrows filled with $CaCO_3$.
24	Carbonate Ooze	0.6	-	-	-	—	—	TR	-	-	Mn staining of noted burrows.
25	Mn Crust	0.5	-	-	-	—	—	10	-	-	Attached sediment noted.
(26 - 27)	Consolidated Carbonate Ooze	0.6 tot.	-	-	-	—	—	TR	-	-	2 samples total. Mn staining noted.
28	Mn Crust	0.2	-	-	-	—	—	40	-	-	-
29	"	0.2	-	-	-	—	—	10	-	-	-
30	"	0.5	-	-	-	—	—	20	-	-	Worm burrows noted.
31	Consolidated Carbonate Ooze	0.5	-	-	-	—	—	TR	-	-	Mn staining noted.
32	Mn Crust	0.4	-	-	-	—	—	20	-	-	-
33	Consolidated Carbonate Ooze	0.6	-	-	-	—	—	TR	-	-	Mn staining noted.
34	Mn Crust	0.6	-	-	-	—	—	30	-	-	Worm burrows noted.
35	Carbonate Ooze	0.5	-	-	-	—	—	TR	-	-	Mn staining of noted burrows.
(36 - 37)	Mn Crust	0.6 tot.	-	-	-	—	—	20-40	-	-	2 samples total.
38	Consolidated Carbonate Ooze	1.0	-	-	-	—	—	TR	-	-	Mn staining noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 17 DREDGE 17 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/10/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
39	Mn Crust	0.2	-	-	-	—		20	-	-	-
40	Mn Crust	0.2	-	-	-	—		30	-	-	-
41	Consolidated Carbonate Ooze	0.7	-	-	-	—		10	-	-	-
42	Consolidated Sediment	0.2	-	-	-	—		10	-	-	Notable Mn — crust.
43	Mn Crust	0.9	-	-	-	—		20	-	-	Fragments.
44	"	0.2	-	-	-	—		20	-	-	-
45	Coral	-	-	-	-	—		—	—	-	Horn coral.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 19 DREDGE 19 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/12/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 4)	Basalt?	2.0 tot.	F	-	TR - Pg	—		5	L	-	(4 samples total.) Greenish-gray, quite dense.
5	Vesicular Basalt	0.6	A	-	-	40%	A	TR	H	-	Attached consolidated sediment. Mn staining, $CaCO_3$ coating and infilling.
(6 - 16)	Consolidated Sediment	>17.0 tot.	-	-	-	—		1-2	-	To limestone.	(11 samples total.) $CaCO_3$-rich sediment. Burrows noted.
17	Mn Pavement	0.7	-	-	-	—		20	-	-	Botryoidal character. Burrows noted.
(18 - 19)	"	0.7	-	-	-	—		20	-	-	(2 samples total.) Botryoidal character, $CaCO_3$ ooze attached.
20	Mn Nodule	0.5	-	-	-	—		5	-	-	Consolidated sediment and $CaCO_3$ infillings noted.
21	Mn Crust	1.0	-	-	-	—		10-20	-	-	Botryoidal character. $CaCO_3$ infillings, burrowing
(22 - 23)	Consolidated Sediment	6.8 tot.	-	-	-	—		TR	-	-	(2 samples total.) Burrows Mn staining.
(24 - 26)	Breccia	2.7 tot.	C	Carbonate cement.	Weathered, vesicular basalt clasts.	20%	C	20	M	-	(3 samples total.) Layered, botryoidal Mn-crust. Burrowing noted.
27	Breccia	0.2	C	Carbonate cement.	Weathered, vesicular basalt clasts.	TR	TR	20	H	-	-
28	Breccia	0.1	C	Carbonate cement.	Weathered, vesicular basalt clasts.	TR	TR	5	H	-	Botryoidal Mn - crust.
29	"	0.2	C	"	"	TR	TR	5	H	-	-
30	Mn Crust	0.1	-	-	-	—		5	-	-	Attached consolidated sediment. Botryoidal crust.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 20 DREDGE 20 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/13/75

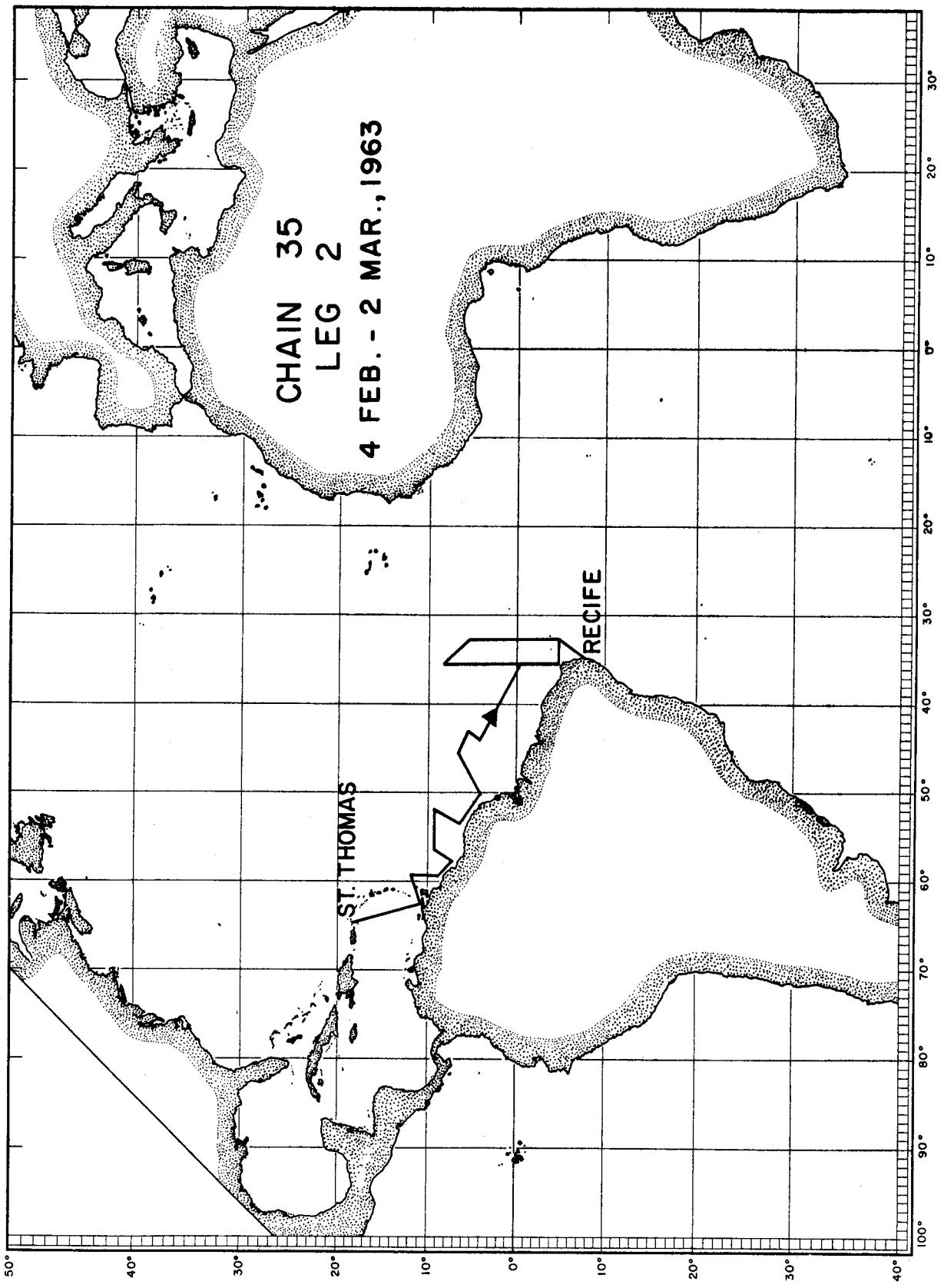
Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 2)	Limestone	10.7 tot.	F	-	-			10	L	-	2 samples total. Burrows noted with ooze infilling.
(3 - 4)	Consolidated Sediment	5.0 tot.	-	Carbonate.	-			TR	-	-	2 samples total. $CaCO_3$ infilling of burrows.
5	Limestone	1.0	F	-	-			TR	L	-	Burrows noted. Appears freshly broken.
(6 - 7)	Consolidated Sediment	1.6	-	Carbonate.	-			TR	-	-	2 samples total. $CaCO_3$ infilling of burrows.
8	"	2.0	-	"	-			TR	-	-	Mn staining and burrows noted. $CaCO_3$ sediment, with some shell fragments.
(9 - 13)	Consolidated Sediment	5.8 tot.	-	Carbonate.	-			TR	-	-	5 samples total. $CaCO_3$ sediment, Mn staining and burrows noted.
14	Consolidated Sediment	0.6	-	Carbonate.	-			TR	-	-	$CaCO_3$ infilling of burrows. Attached coral fragment.
15	"	0.6	-	"	-			TR	-	-	$CaCO_3$ sediment, Mn staining, burrows noted.
16	"	0.4	-	"	-			TR	-	-	$CaCO_3$ infilling of burrows.
17	"	0.5	-	"	-			TR	-	-	$CaCO_3$ sediment, Mn staining, with burrows noted.
(18 - 19)	"	0.7 tot.	-	"	-			TR	-	-	2 samples total. $CaCO_3$ infilling of burrows. Attached coral fragments.
(20 - 22)	Consolidated Sediment	1.1 tot.	-	Carbonate.	-			TR	-	-	3 samples total. $CaCO_3$ sediment, Mn staining and burrows noted.
23	Consolidated Sediment	0.4	-	Carbonate.	-			TR	-	-	$CaCO_3$ infilling of burrows.
24	"	0.4	-	"	-			TR	-	-	$CaCO_3$ sediment, Mn staining and burrows noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE AII 93 STATION 20 DREDGE 20 DESCRIBED BY S. Humphris/G. Thompson/ P. Andrew DATE 12/13/75

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
25	Consolidated Sediment	0.4	-	Carbonate.	-			TR	-	-	Coral remnants on surface. $CaCO_3$ infilling of burrows.
(26 - 28)	"	0.7 tot.	-	"	-			TR	-	-	3 samples total. $CaCO_3$ sediment. Mn staining, burrows noted.
29	Consolidated Sediment	0.2	-	Carbonate.	-			TR	-	-	$CaCO_3$ infilling of burrows.
(30 - 32)	"	0.5 tot.	-	"	-			TR	-	-	Carbonate ooze with Mn staining.
33	"	0.1	-	"	-			TR	-	-	$CaCO_3$ infilling of burrows.
(34 - 36)	"	0.6 tot.	-	"	-			TR	-	-	3 samples total. $CaCO_3$ sediment, Mn staining and burrows noted.
37	Coral	-	-	-	-			TR	-	-	Mn staining noted.
38	Consolidated Sediment	0.2	-	Carbonate.	-					-	Carbonate sediment with coral attached.

		STATION: 21		DREDGE: 21						DATE: 12/14/75
1	Basalt	1.6	F	-	Pg - abundant.			1	L	-	Carbonate veining noted.
2	"	0.7	F	-	Ol - altered Pg.				H	-	Veining noted. Chill margin evident.
3	Breccia	1.0	C	Carbonate cement.	Clasts of highly weathered basalt.			TR	M	Cemented.	Some clasts exhibit plag. phenocrysts.
4	"	1.0	C	"	"			TR	M	"	"


CHAIN 35
LEG 2
4 FEB. - 2 MAR., 1963
ST. THOMAS
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********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
CHN	35	2	0001	0000	8	63 3 5	0 33.0'N	32 47.0'W	1	4.02	0001	4291.	4291.	0000	15	0000	0	
CHN	35	2	0002	0000	8	63 3 5	0 34.0'N	32 55.0'W	1	4.02	0002	3929.	3929.	4.8K	15	0000	0	
CHN	35	2	0003	0000	8	63 3 6	0 50.5'S	30 6.5'W	1	303.00	0003	4408.	4408.	097K	15	0000	0	
CHN	35	2	0007	0000	8	63 3 7	0 54.0'N	29 23.0'W	1	3.09	0007	1109.	1109.	107K	15	0000	0	
CHN	35	2	0008	0000	8	63 3 8	0 57.0'N	28 22.0'W	1	3.08	0008	3219.	3219.	6.5K	15	0000	0	
CHN	35	2	0011	0000	8	63 3 9	1 27.0'S	29 14.0'W	1	302.19	0011	4353.	4353.	8.4K	15	0000	0	
CHN	35	2	0012	0000	11	63 313	7 38.5'S	34 37.0'W	1	303.74	0012	28.	28.	0000	14	0000	0	
CHN	35	2	0004	0000	8	63 3 7	0 57.0'S	30 8.0'W	1	303.00	0004	4320.	4320.	026K	15	0000	0	
CHN	35	2	0015	0000	7	63 317	0 56.4'N	29 21.5'W	1	3.09	0015	300.	300.	2.7K	14	0000	0	
CHN	35	2	0016	0000	7	63 317	0 55.6'N	29 22.5'W	1	3.09	0016	113.	113.	3.7K	14	0000	0	
CHN	35	2	0018	0000	8	63 318	0 55.0'N	29 20.0'W	1	3.09	0018	1113.	1113.	142K	14	0000	0	
CHN	35	2	0019	0000	7	63 319	0 44.0'N	34 47.0'W	1	4.04	0019	4072.	4072.	037K	6	0000	0	
CHN	35	3	0020	0000	12	63 4 0	7 33.0'N	44 59.0'W	1	5.74	0020	4663.	4663.	0000	6	0000	0	
CHN	35	3	0021	0000	12	63 4 0	5 33.0'N	51 21.0'W	1	6.51	0021	91.	91.	001K	2	0000	0	
CHN	35	3	0022	0000	12	63 4 0	5 28.0'N	51 38.0'W	1	6.51	0022	72.	72.	0000	2	0000	0	
CHN	35	3	0023	0000	12	63 4 0	5 32.2'N	51 33.0'W	1	6.51	0023	62.	62.	0000	2	0000	0	
CHN	35	3	0024	0000	12	63 4 0	5 31.0'N	52 7.0'W	1	6.52	0024	57.	57.	004K	2	0000	0	
CHN	35	3	0025	0000	12	63 4 0	5 28.0'N	52 19.0'W	1	6.52	0025	41.	41.	0000	2	0000	0	
CHN	35	3	0026	0000	12	63 4 0	5 39.0'N	52 39.0'W	1	6.52	0026	38.	38.	0000	2	0000	0	
CHN	35	3	0027	0000	12	63 4 0	6 6.0'N	55 12.5'W	1	6.55	0027	26.	26.	0000	2	0000	0	
CHN	35	3	0028	0000	12	63 4 0	6 20.0'N	55 4.0'W	1	6.65	0028	20.	20.	0000	2	0000	0	
CHN	35	3	0030	0000	12	63 4 0	6 41.0'N	54 52.5'W	1	6.64	0030	38.	38.	0000	2	0000	0	
CHN	35	3	0031	0000	12	63 4 0	6 52.0'N	54 46.0'W	1	6.64	0031	53.	53.	0000	2	0000	0	
CHN	35	3	0032	0000	12	63 4 0	7 4.0'N	54 39.0'W	1	6.74	0032	70.	70.	0000	2	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 2 DREDGE 2 DESCRIBED BY Paul Andrew/D. Bergersen DATE 6/27/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2-1B	Vesicular Basalt	4.8	A	-	-	15%	5%	15	M	-	Layered vesicles. Top layer filled with calcite.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 3 DREDGE St. Paul RX DR-3 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Dunite	1.9	F	Olivine.	-				F	-	Oriented sample (?)
2	"	0.7	F	"	-				F	-	"
3	"	0.7	F	"	-				F	-	"
4	"	0.4	F	"	-				F	-	"
5	"	0.3	F	"	"				F	-	"
6	"	0.6	F	"	"				F	-	"
7	"	5.2	F	"	"				F	-	"
8	"	1.0	-	"	Small porphyroclasts of spinel.					-	Slightly phosphatized.
9,10,11	NO SAMPLE AVAILABLE										
12	Dunite Conglomerate	1.1	F	Calcareous&phosphatic matrix.	-					-	Dunite fragments in matrix.
13	"	2.6	F	"	-					-	Dunite fragments weathered.
14	"	1.4	F	"	-					-	-
15	"	1.9	F	"	-					-	Dunite fragments are large, rounded and unweathered.
16	"	2.3	F	"	-					-	"
17	"	2.0	F	"	-					-	Dunite fragments in matrix
18	Serpentinite	3.7	A	Serpentine.	-					-	Very dark grey weathering noted.
19	Serpentinized Dunite	1.9	A	"	-				H	-	Small relics and weathered dunite noted.
20	"	2.0	A	"	-				H	-	Relics of dunite (~10%) noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 3 DREDGE St. Paul RX DR-3 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
21	Serpentinized Dunite	2.8	A	Serpentine.	-				H	-	Sample exhibits trace dunite fragments (∿5%).
22	"	2.2	A	"	-				M	-	(∿40%) dunite relics.
23	"	2.7	A	"	-				H	-	-
24	"	1.9	A	"	-					-	Cone of dunite unweathered.
25	Dunite	3.5	M	Olivine.	Spinel porphyroclasts.				F	-	-
26	"	1.8	M	"	-				F	-	-
27	"	3.4	M	"	Unidentified porphyroclast.				F	-	Sample also exhibits compositional layering.
28	"	4.4	M	"	Abundant small spinel porphyroclasts.				F	-	-
29	"	3.4	M	"	-				F	-	Cut surface of this sample exhibits folds.
30	"	3.0	M	"	Small porphyroclasts of spinel.				F	-	-
31	Brecciated Dunite	3.7	M	"	-				L	-	Sample exhibits compositional foliation.
32	Phosphatized Dunite	1.7	-	-	-				H	-	Fragmental rock.
33	Dunite	4.4	-	Olivine.	-				F	-	-
34	Phosphatized Dunite	1.6	-	-	-					-	Completely phosphatized.
35	"	1.6	-	-	-					-	"
36	"	2.1	-	-	-					-	"
37	"	2.7	-	-	-					-	"
38	"	2.7	-	-	-					-	Partially phosphatized dunite.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 3 DREDGE St. Paul RX DR-3 DESCRIBED BY G. Thompson/D. Bergensen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
39	Phosphatized Dunite	2.0	M	-	-					-	Partially phosphatized dunite.
40	"	2.8	M	-	-					-	"
41,42,43,44	MISSING	-	-	-	-					-	-
45	Phosphatized Dunite	1.9	-	-	-					-	-
No #- Labeled St.	Paul's Coral										
"	Fragments"	10.9	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 4 DREDGE 4 DESCRIBED BY Paul Andrew/D. Bergersen DATE 6/27/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
GROUP I											
2, 5	Weathered Basalt	5.3	A	-	2% Pg.	2%	TR	10	H	-	Weathering notable.
GROUP II											
4	Weathered Basalt	0.5	A	-	-	1%	TR	1-2	H	-	Weathering notable.
4-unlabeled	"	20	A	-	-	1%	TR	10	H	-	Weathering notable, large boulder.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 6 DREDGE 6 DESCRIBED BY Paul Andrew/D. Bergersen DATE 6/27/85

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
6-Fragments	Serpentine	8.5	A	-	-					-	Many pebble sized fragments.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
NOTE:	SAMPLE WEIGHTS	ARE	GROUPED AND LOGGED		AT END OF SAMPLE DESCRIPTION					(SEE PAGE # 205)	
1	Dunite	-	-	Olivine.	-				M	~5% Ol. to Serp.	Abundant spinel, weather-rind and calcite coating notable.
2	Serpentinite	-	-	Serpentine.	-				F	-	Sample exhibits trace amounts on olivine and a calcite vein.
3	Dunite	-	-	Olivine.	Large porphyro-blast of pyroxene.				M	~10% Ol. to Serp.	Angular, sample with notable weathering rind.
4	"	-	-	"	-				H	-	Sample rounded and calcite coated.
5	Serpentinite	-	-	Serpentine.	-				M	-	Sample exhibits olivine relics, calcite coatings, and worm tubes.
6	Dunite	-	-	Olivine.	Porphyroblasts of spinel and pyroxene.				L	2% Ol. to Serp.	Angular fragment with scattered worm tubes.
7	"	-	-	"	-				F	~10% Ol. to Serp.	Calcite coated angular fragment.
8	"	-	-	"	-				F	~50% Ol. to Serp.	Rounded sample with calcite coating and coral base.
9	"	-	-	"	-				F	<5% Ol. to Serp.	Calcite coated sample with large porphyroblast notable.
10	Serpentinite	-	-	Serpentine.	-				F	-	Highly sheared, dark sample exhibiting pronounced foliation.
11	Dunite	-	-	"	-				F	<5% Ol. to Serp.	Angular fragment.
12	Serpentinite	0.01	F	-	-				F	-	Angular, oxide rich sample.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/P. Andrew DATE 6/25/85

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
13	Serpentinite	-	-	Serpentine.	-				H	-	Rounded fragment with abundant secondary calcite.
14	"	-	-	"	-				F	-	Scattered spinel crystals and attached worm tubes noted.
15	Dunite	-	-	Olivine.	-				F	-	Attached worm tubes noted.
16	"	-	-	"	-				L	~5% serpentine (in veins).	Spinel layers and attached worm tubes.
17	Serpentinite	-	-	Serpentine.	-				H	-	Angular fragment with abundant calcite, worm tubes and forams.
18	"	-	-	"	-				H	-	Brecciated. Calcite, coral stems and forams noted.
19	"	-	-	"	-				M	-	Calcite vein and worm tubes noted.
20	"	-	-	"	-				H	-	Phosphatized, rounded fragments.
21	"	-	-	"	-				M	-	Olivine and spinel noted along with copper staining.
22	Hornblende Dunite	-	-	Olivine.	Porphyroblasts of hornblende.				L	TR-Serpentine.	Calcareous coatings noted.
23	Serpentinite	-	-	Serpentine.	-				H	-	Abundant veins of calcite noted.
24	"	-	C	"	-				H	-	Sheared.
25	Serpentine Conglomerate	-	-	Calcareous matrix.	Clasts of Serpentine.				H	-	Rounded, fragmental rock with abundant calcite and forams.
26	"	-	-	"	"				H	-	"
27	Serpentinite	-	-	-	-				H	-	Sample rounded and exhibits abundant calcite veining.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
28	Serpentine Conglomerate	—	-	Calcareous Matrix.	Clast of Serp.				F	-	Rounded sample with abundant calcite and worm tubes?
29	"	—	-	"	"				F	-	Clasts are rounder and browner than previous sample.
30	Dunite	-	-	Olivine.	-				M	<20% Ol. to Serp.	Sample slightly rounded and exhibits a thick weathering rind. Calcareous coating noted.
31	Dunite	-	-	Olivine.	-				F	<20% Ol. to Serp.	Exhibits slight rounding and possible worm tubes.
32	"	-	-	"	-				H	"	Slighted rounded and calcite coated, with worm tubes.
33	"	-	-	"	-				M	"	Sample slightly rounded with calcite coating and forams.
34	"	-	-	"	-				M	"	Sample exhibits calcite and limonite coating with forams.
35	"	-	-	"	-				H	"	Calcite coated with forams.
36	"	-	-	"	Large spinel porphyroclast.				M	"	Sample contains serpentine veins and crystalline calcite coating on one surface. Weathering rind noted.
37	Dunite	-	-	Olivine.	Small spinel porphyroclast.				M	<20% Ol. to Serp.	Rounded sample with thin serpentine veinlets and weathering rind.
38	Dunite	-	-	Olivine.	-				M	<20% Ol. to Serp.	Angular sample with fragmental coating and abundant forams.
39	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Sample exhibits layers of spinel and a calcite coating.
40	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Slightly rounded sample with calcite coating and forams.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
41	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Angular sample with worm tubes noted.
42	"	-	-	"	-				M	"	Slightly rounded sample.
43	"	-	-	"	-				H	"	Sample slightly rounded, fragmental coating with
											forams noted.
44	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Rounded sample containing calcite coating with forams.
45	"	-	-	"	-				F	"	Slightly rounded and exhibits worm tubes.
46	"	-	-	"	-				H	"	Calcite coating contains fragments of serpentine.
47	"	-	-	"	-				M	Abundant Ol. to Serp.	Sample is rounded and calcite coated. Worm tubes
											noted.
48	Dunite	-	-	Olivine.	-				M	Abundant Ol. to Serp.	Highly rounded sample.
49	"	-	-	"	-				M	<20% Ol. to Serp.	Calcite coated with forams and a thin weathering rind.
											Slightly rounded.
50	Dunite	-	-	Olivine.	-				M	<20% Ol. to Serp.	"
51	"	-	-	"	-				L	"	Angular sample with worm tubes notable.
52	"	-	-	"	Large Px.				M	"	Slightly rounded sample with thin weathering rind.
53	"	-	-	"	-				M	"	Calcite coated sample with worm tubes.
54	Missing										
55	Dunite	-	-	"	-				H	"	Sample contains abundant calcite and a coral base.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
56	Missing	–	–	–	–	–	–	–	–	–	–
57	Dunite	–	–	Olivine.	–				F	<20% Ol. to Serp.	Rounded sample with worm tubes.
58	"	–	–	"	–				H	"	"
59	"	–	–	"	–				M	"	Slightly rounded with notable weathering rind.
											Worm tubes present.
60	Dunite	–	–	Olivine.	–				M	<20% Ol. to Serp.	Moderately rounded sample with a fragmental coating.
61	"	–	–	"	–				M	"	Rounded sample with calcite coating.
62	Serpentinite	–	–	–	–				M	–	Sample abundantly veined by calcite. Coral base
											noted.
63	Dunite	–	–	Olivine.	–				M	<20% Ol. to Serp.	Sample exhibits poor foliation and calcite coating
											with serpentine fragments.
64	"	–	–	"	–				M	<20% Ol. to Serp.	Slightly rounded sample with thick weathering rind.
65	"	–	–	"	–				H	"	Calcite coated with forams.
66	"	–	–	"	–				H	"	"
67	Missing	–	–	–	–	–	–	–	–	–	–
68	Dunite	–	–	Olivine.	–				H	<20% Ol. to Serp.	Slightly rounded sample with worm trail noted.
69	"	–	–	"	–				M	"	Angular sample with calcite Coatings. Forams present.
70	"	–	–	"	–				M	"	Sample is rounded and contains carbonate coating.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
71	Dunite	-	-	Olivine.	-				M	< 20% Ol. to Serp.	Exhibits well developed spinel layers and foliation.
72	"	-	-	"	-				M	"	Calcite coated sample with thick weathering rind.
73	"	-	-	"	-				M	"	Rounded sample with calcite cemented foram coating.
74	"	-	-	"	Small spinel + Cpx.				M	-	"
75	"	-	-	"	Abundant small spinel + Cpx.				M	<5% Ol. to Serp.	Angular fragment with thick weathering rind.
76	"	-	-	"	-				M	<20% Ol. to Serp.	Sample exhibits a thick weathering rind and angular nature.
77	Dunite	-	-	Olivine.	Large porphyroclasts of Px.				L	<20% Ol. to Serp.	Angular sample with worm tubes notable.
78	"	-	-	"	-				H	"	Rounded sample.
79	"	-	-	"	-				M	"	Calcareous coated, slightly rounded sample.
80	"	-	-	"	Large Px. porphyroclasts.				L	"	Angular fragment with worm tubes notable.
81	"	-	-	"	-				H	"	Calcite coating with forams noted. Slightly rounded sample.
82	Dunite	-	-	Olivine.	-				M	<20% Ol. to Serp.	Same as previous sample, only coating contains dunite also.
83	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Part of a conglomerate cemented by calcite.
84	"	-	-	"	-				M	"	Rounded sample with calcite coating and notable rind.
85	"	-	-	"	-				H	"	"

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/21/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
86	Serpentinite	-	-	-	-				M	-	Slightly rounded sample with calcite coating.
87	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Rounded sample with worm tubes notable.
88	"	-	-	"	-				H	"	Calcite coated, slightly rounded sample.
89	"	-	-	"	-				H	"	Sample rounded and with forams in calcite on surface.
90	"	-	-	"	-				M	"	Angular fragment. Forams and worm tubes noted.
91	"	-	-	"	-				H	"	Rounded sample with forams and worm tubes in calcite.
92	"	-	-	"	-				H	"	"
93	"	-	-	"	-				L	"	Angular fragment.
94	"	-	-	"	-				F	"	Slightly rounded with calcite coating.
95	"	-	-	"	-				L	"	Angular fragment with abundant foram-calcite coating.
96	"	-	-	"	-				H	"	Slightly rounded sample with calcite coating.
97A	"	-	-	"	Large porphyroclasts of spinel.				F	"	"
97B	Dunite, Spinel	-	-	"	-				F	"	Spinel is cut by serpentine vein. Sample is rounded.
98	Dunite	-	-	"	-				M	"	Angular fragment with open veins containing calcite crystals.
99	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Calcite coated, with worm tubes.
100	Dunite, Spinel	-	-	"	-				L	<10% Ol. to Serp.	"
101	Dunite	-	-	"	-				M	<20% Ol. to Serp.	Like No. 99. Moderate weathering rind notable.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/21/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
102	Missing	–	–	–	–	–	–	–	–	–	–
103	Missing	–	–	–	–	–	–	–	–	–	–
104	Dunite	–	–	Olivine.	–				H	<20% Ol. to Serp.	Abundant green and brown spinel notable.
105	"	–	–	"	–				L	"	Angular fragment with worm tubes.
106	"	–	–	"	Large porphyroclasts of spinel.				M	"	Angular fragment exhibiting a thin weathering rind.
107	"	–	–	"	–				M	"	Calcite coated, slightly rounded sample with worm
											tubes.
108	Dunite	–	–	Olivine.	–				M	<20% Ol. to Serp.	Calcite coated, slightly rounded sample with worm
											tubes. Thin rind notable.
109	Dunite	–	–	Olivine.	–				H	<20% Ol. to Serp.	Calcite coated, slightly rounded sample with worm
110											tubes. Thin rind notable.
110	Dunite	–	–	Olivine.	–				M	<20% Ol. to Serp.	Rounded sample with weathering rind and calcite coating.
111	"	–	–	"	–				M	"	Angular fragment exhibiting a thick weathering rind.
112	"	–	–	"	–				H	–	Sample cut by fine grain calcite veins and is
											rounded.
113	Dunite	–	–	Olivine.	–				M	<20% Ol. to Serp.	Slightly rounded sample coated with calcite and
											forams.
123	Serpentinite	–	–	–	–				M	–	Rounded sample with calcite coating and worm tubes.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/21/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
129	Dunite	-	-	Olivine.	-				M	<20% Ol. to Serp.	Rounded sample cut by serp. veinlets. Worm tubes rare.
*	The samples from #114 - #134 and #206 are similar to #129 with the exception of the following:										
	#120, #123, #129, #132, #143, #146, #148, #152, #157, #168, #172, #175 and #182.										
132	Dunite	-	-	Olivine.	-				F	<20% Ol. to Serp.	Angular fragment with calcite coating. Forams noted
148	"	-	-	"	-				H	"	Sample slightly rounded and calcite coated, with loose forams.
172	Dunite	-	-	Olivine.	-				H	<20% Ol. to Serp.	Calcite coated sample exhibiting forams.
182	"	-	-	"	-				M	<10% Ol. to Serp.	Moderately rounded sample with calcite coating containing dunite fragments and some large spinels.
199	Dunite (grey)	-	-	Olivine (spinel).	-				F	-	Slightly rounded sample containing a green transparent mineral (?) and some worm tubes.
*	The following samples are similar to #199: #120, #146, #192, #210, and #217.										
211	Dunite (Dark Grey)	-	A	Olivine.	-				F	Difficult to estimate degree of serp.	Angular to slightly rounded sample exhibiting massive character. Some worm tubes notable.
*	The samples from #185 - #218 are similar to #211 with the exception of the following:										
	#192, #199, #206, #210, and #217.										
237	Serpentinite	-	-	-	-				F-M	-	Angular to slightly rounded samples exhibiting small areas of relic dunite and occasional worm tubes.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/21/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
*	The following samples are similar to #237: #219, #220, #221, #222, #223, #224, #225, #226,										
	#228, #229, #231, #236, #246, #251, #253, #264, #295 and #305.										
265	Dunite (Medium Grey)	-	-	Olivine,	-				F	<30% Ol. to Serp.	Samples angular to subrounded w/abundant spinel present
											Serpentine veins notable along w/a few worm tubes.
*	The following samples are similar to #265: #223, #227, #230, #232, #234, #235, #239, #240, #241, #243,										
	#244, #245, #247, #249, #254, #256, #257, #258, #260, #261, #262, #267, #268, #269, #270, #271, #272, #273,										
	#274, #275, #277, #279, #280, #281, #282, #283, #284, #285, #286, #288, #289, #291, #292, #294, #296, #298,										
	#301, #302, #303, #304, #306, #308 and #309.										
278	Dunite	-	-	Olivine.	-				F	<20% Ol. to Serp.	Slightly rounded sample very rich in spinel, with worm tubes.
297	Dunite (Light Grey)	-	-	Olivine.	-				F-L	<10% Ol. to Serp.	Samples angular to slightly rounded with some showing worm tubes.
*	The following samples are similar to #297: #242, #250, #252, #259, #260, #276, #300, #307 and #310.										
323	Dunite	-	-	Olivine.	-				F	<10% Ol. to Serp.	Angular samples (#323 rounded) with scattered worm tubes. #360 exhibits a calcite coating.
*	The following samples are similar to #323: #299, #315, #322, #328, #332, #338, #342, #343, #344, #345,										
	#346, #347, #348, #349, #350, #351, #352, #354, #355, #359, #360, #361, #363, #364, #365 and #366.										
362	Serpentinite	-	-	-	-				F	20 - 40% Ol. to Serp.	Brecciated and slightly rounded samples with rare worm tubes.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
*	The following samples are similar to #362: #293 and #356.										
373	Dunite (Light Grey)	-	-	Olivine.	-				F-M	<20% Ol. to Serp.	Samples are angular to slightly rounded with some exhibiting a thin weathering rind and scattered serpentine veins. A few worm tubes noted.
*	The following samples are similar to #373: #367, #368, #370, #371, #374 - #380, #386, #387, #390,										
	#391 - #394, #399, #404, #405, #406, #409, #410, #411, #412, #414, #415, #419 - #425 and #427.										
383	Dunite (Medium Grey)	-	-	Olivine.	-				F	<10% Ol. to Serp.	Angular to slightly rounded samples weathering to a dark grey color. Some exhibit serpentine veins and worm tubes.
*	The following samples are similar to #383: #369, #370, #384, #388, #389, #395, #396, #397, #398,										
	#400, #401, #403, #408, #413, #416, #417, #418 and #426.										
385	Serpentinite	-	-	-	-				F-M	-	Samples rounded and exhibit rare areas of fresh dunite. A few worm tubes notable.
*	The following samples are similar to #385: #381, #382 and #407.										
395	Dunite	-	-	Olivine.	-				F	<20% Ol. to Serp.	Angular fragment exhibiting foliation and hornblende layering.
470	Dunite	-	-	Olivine.	-				F	<5% Ol. to Serp.	Samples contain abundant hornblende and rare worm tubes.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
*	The following samples are similar to #470: #320 and #353.										
489	Dunite	-	-	Olivine.	-				F	<5% Ol. to Serp.	Angular to subrounded sample. Worm tubes noted on some samples.
*	The following samples are similar to #489: #311, #312, #321, #327, #330, #334, #358, #430, #431,										
	#432, #433, #437, #439, #440, #442, #444,				#454, #459, #461, #467, #468, #469, #475, #479, #482,						
	#485, #486, #489, #490, #497, #498, #504,				#509, #515, #518, #519, #524, #533, #537, #538, #541.						
	#545, #548, #551, #552, #555, #557, #558,				#560, #561, #562 and #565.						
499	Dunite	-	-	Olivine.	-				M-H	<5% Ol. to Serp.	Samples slightly rounded, moderately to heavily weathered, and some exhibit worm tubes.
*	The following samples are similar to #499: #331, #339, #428, #429, #438, #445, #446, #447, #450,										
	#451, #457, #458, #460, #463, #474, #476,				#484, #492, #493, #494, #501, #503, #508, #511, #513, #523,						
	#528, #530, #531, #534, #539, #550, #553,				#567, #568, #574 and #624.						
521	Dunite	-	-	Olivine.	-				F	<10% Ol. to Serp.	Slightly rounded sample exhibiting a large enstatite augen. Worm tubes notable.
527	Serpentinite	-	-	-	-				F	-	Angular to subrounded samples exhibiting a small amount of relic dunite and a few worm tubes.
*	The following samples are similar to #527: #333, #472, #477, #483, #495, #500, #502, #520, #542,										
	#546, #547, #556, #559, #563, #564, #566				and #569.						

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
544	Dunite (Grey)	-	-	Olivine.	-				L	<10%	Lightly weathered, grey sample with angular to sub-
											rounded shape. A few con-
											tain worm tubes.
*	The following samples are similar to #544: #313, #314, #316, #317, #318, #319, #324, #325, #326,										
	#329, #335, #337, #340, #341, #357, #434, #435, #436, #441, #442, #443, #448, #452, #453, #455, #462,										
	#464, #465, #466, #471, #473, #478, #480, #481, #488, #496, #505, #506, #507, #512, #514, #516, #517,										
	#522, #525, #526, #529, #532, #535, #536, #540, #543, #544, #549, #554 and #582.										
578	Amphibole Dunite	-	-	Olivine.	Large porphyro-				F	<30%	Brecciated sample with
					clasts of horn-					Ol. to Serp.	several rock types in
					blende.						"tectonic" contact. Also
											contains abundant veinlets
											of chalcopyrite.
584	Dunite (Light Grey)	-	-	Olivine.	Abundant porphy-				M	<10%	Samples slightly rounded to
					roclasts of					Ol. to Serp.	angular, containing abun-
					hornblende and						dant spinel and hornblende.
					spinel.						Veined serpentine notable
											along with a thin weather-
											ing rind.
*	The following samples are similar to #584: #570, #572 - #577, #579, #580, #581, #583, #585, #586,										
	#588, #589, #592, #593, #594, #596, #600, #601, #602, #604, #606 - #610, #612, #614 - #620, #622,										
	#626, #627, #629, #631, #637 and #639.										
587	Serpentinite	-	-	-	-				F-L	Serpentine re-	Angular to slightly rounded
										places dunite	samples exhibiting <30%
										along veins.	relic olivine. Worm tubes
											are rare.
*	The following samples are similar to #587: #571, #598, #603, #605, #611, #613, #625, #630, #633 and #686.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
588	Calcareous fragmental rock	-	-	-	-				F	-	Rounded sample.
590	Serpentine Conglomerate	-	-	Calcareous matrix.	Serpentine clasts.				F	-	Sample rounded and exhibits euhedral calcite crystals in some places.
591	Dunite	-	-	Olivine.	-				L	-	Calcite coated, rounded sample.
621	"	-	-	"	-				M	-	Rounded sample exhibiting a thick weathering rind.
632	Brecciated Dunite	-	-	Calcite.	Fragments of Dunite.				H	-	Rounded to angular fragments of dunite cemented by calcite.
635	Dunite	-	-	Olivine.	-				M	-	Sample rounded and calcite coated. Forams and fragments of dunite notable in coating.
638	Dunite Conglomerate	-	-	Olivine.	Imbedded Pebble.				H	-	Pebble one-third imbedded in dunite conglomerate. Non-biogenic coating on one side.
641	Dunite Conglomerate	-	-	Olivine.	Imbedded Pebble.				H	-	Pebble one-third imbedded in dunite conglomerate. Non-biogenic coating on one side.
643	Dunite Conglomerate	-	-	Olivine.	Imbedded Pebble.				H	-	-
644	Dunite	-	-	"	-				M	-	Slightly rounded sample with euhedral calcite crystals in surface.
645	Dunite	-	-	Olivine.	-				M	-	Angular fragment exhibiting carbonate coating on one side.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
649	Missing	—	—	—	—	—	—	—	—	—	—
650	Missing	—	—	—	—	—	—	—	—	—	—
651	Dunite	-	-	Olivine.	-				H	-	Exhibits carbonate coating in crevices and locally abundant forams.
652	Dunite Conglomerate	-	-	Olivine.	-				H	-	Heavily weathered-rounded sample.
653	Dunite	-	-	"	-				M-H	-	Rounded sample with one freshly broken surface. Forams noted.
654	Dunite Cobble	-	-	Olivine.	-				H	-	Angular fragment with carbonate coating exhibited on one side. Forams locally abundant.
655	Dunite Cobble	-	-	Olivine.	-				H	-	Angular sample coated with carbonate. Serpentine and calcite veining notable.
656	Dunite	-	-	Olivine.	-				H	-	Rounded sample with carbonate coating on one side and serpentine veins throughout.
657	-	-	-	-	-					-	-
659	Dunite Conglomerate	-	-	Olivine.	-				H	-	Subangular fragment exhibiting a coating.
660	-	-	-	-	-					-	-
661	Dunite	-	-	Olivine.	-				F	<5% Ol. to Serp.	Subangular sample.
662	"	-	-	"	-				F	<5% Ol. to Serp.	Angular fragment.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
663	Dunite	-	-	Olivine.	-				F	<30% Ol. to Serp.	Angular fragment containing abundant hornblende.
664	Dunite Conglomerate	-	-	"	-				M	-	Rounded mass composed of angular dunite fragments and a few worm tubes.
665	Missing	-	-	-	-	-	-	-	-	-	-
666	Dunite Conglomerate	-	-	Olivine (?).	-				H	-	Sample rounded with a few notable forams attached.
667	Dunite	-	-	"	-				M-H	~50% Ol. to Serp.	Subangular fragment with crystalline calcite coating.
668	"	-	-	Olivine.	-				F	<5% Ol. to Serp.	Rounded sample with scattered worm tubes.
669	Dunite	-	-	"	-				F	<30% Ol. to Serp.	Angular fragment with calcite coating and worm tubes.
670	"	-	-	"	-				F	<10% Ol. to Serp.	Brecciated sample.
671	"	-	-	"	-				F	<5% Ol. to Serp.	Slightly rounded specimen exhibiting red veinlet.
672	"	-	-	"	Three large porphyroclasts of orthopyroxene.				F	<5% Ol. to Serp.	Subangular fragment.
673	Dunite	-	-	Olivine.	-				M	<5% Ol. to Serp.	Angular fragment.
674	"	-	-	"	-				F	<5% Ol. to Serp.	Subrounded sample exhibiting euhedral crystals of calcite and a veinlet of a green mineral.
675	Dunite	-	-	Olivine.	-				F	<30% Ol. to Serp.	Slightly rounded sample with worm tube notable.
676	"	-	-	"	-				H	<20% Ol. to Serp.	Rounded sample.
677	"	-	-	"	-				F	<5% Ol. to Serp.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
678	Dunite	-	-	Olivine.	-				F	<5% Ol. to Serp.	Large, angular fragment. A few worm tubes notable.
679	"	-	-	"	-				F	<5% Ol. to Serp.	Angular fragment.
710	Serpentinite	-	-	-	-				F	70% Serp.	Angular to subangular. sample mylonitized.
											then brecciated and serpentinized. worm tubes are rare.
*	The following samples are similar to #710: #681, #684, #686, #690, #697, #701, #705, #707, #718,										
	#727, #737 and #739.										
725	Dunite	-	-	Olivine.	-				F	<10% Ol. to Serp.	Samples are angular to subangular with a few notable tube worms.
*	The following samples are similar to #725: #680, #682, #683, #685, #687, #688, #689, #692 - #696,										
	#698, #699, #700, #702, #703, #704, #706, #709, #711, #713, #714, #715, #719 - #724, #726, #728,										
	#729, #732, #733, #735, #736 and #738.										
730	Dunite	-	-	Olivine.	-				M	<5% Ol. to Serp.	Slightly round sample with notable weathering rind and greenish-blue layer.
*	The following samples are similar to #730: #56, #103, #143, #153, #157, #168, #175, #184, #255,										
	#402, #585, #591, #628, #642, #647, #649, #716 and #805.										
731	Dunite	-	-	Olivine.	-				M	<5% Ol. to Serp.	Angular fragment containing abundant hornblende and diopside.
734	Dunite	-	-	Olivine.	-				F-M	<10% Ol. to Serp.	Subrounded samples.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
*	The following samples are similar to #734: #263, #336, #597, #634, #708, #750, #782 and #801.										
741	Serpentinite	-	-	-	-				F	<50% Ol. to Serp.	Brecciated angular to sub-angular samples with scattered worm tubes.
*	The following specimens are similar to #741: #743, #746, #747, #748, #749, #751, #752, #761, #762, #763, #766 - #769.										
773	Dunite (Grey)	-	-	Olivine.	-				F-L	<10% Ol. to Serp.	Samples angular to slightly rounded with few worm tubes.
*	The following samples are similar to #773: #740, #742, #744, #745, #749, #752 - #760, #764, #765, #770, #771, #772, #774 and #821.										
788	Dunite	-	-	Olivine.	Large brown hornblende porphyroclasts.				F	<5% Ol. to Serp.	Slightly round sample with notable worm tubes.
790	Dunite	-	-	Olivine.	-				F	<10% Ol. to Serp.	Angular to subrounded samples. Trace worm tubes noted.
*	The following samples are similar to #790: #775, #776, #777, #780, #781, #782, #785, #786, #787 #789, #791, #793, #794, #796, #797, #799, #802, #803, #807 #811, #814, #815, #816, #817 and #819.										
792	Serpentinite	-	-	-	-				F	20-50% Ol. to Serp.	Angular to subrounded samples. Worm tubes are rare.
*	The following samples are similar to #792: #778, #779, #783, #784, #795, #798, #800, #804, #806, #813, #818 and #822.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/24/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
820	Serpentinite	-	-	-	-				M	-	Rounded samples.
*	The following samples are similar to #820: #238, #646, #658 and #812.										
SAMPLES #'s	COMBINED WEIGHT OF SAMPLES				DREDGE: 7						
1 - 29		22.0	kg								
30 - 189		15.0	kg								
190 - 349		15.0	kg								
350 - 509		15.0	kg								
510 - 666		21.0	kg								
667 - 789		19.0	kg								

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 8 DREDGE 8 DESCRIBED BY Paul Andrew DATE 6/26/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
8-1	White, semi-lithified calc ooze with Mn crust	6.5	A	-	-	—	—	1-5	-	-	Worm burrows noted. Note: Sample consists of 3-1 pint jars of pebble-sized chunks and 3 bags of boulder-sized fragments.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 11 DREDGE 11 DESCRIBED BY Paul Andrew DATE 6/26/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9,	Semi-lithified calc ooze (and layered unknown)	1	A	-	-	—		TR	-	-	Small pebble-sized fragments (stored in vials and bags).
(17-158) -	- (except #120 and	#132)	- -	(see below), +	#170, #171, #174, #176,			#177	and	#178.	Some exhibit Mn-Fe oxide coatings and worm burrows. Either massive or layered morphologies are noted. The massive forms (calc-ooze) react with HCL, while the layered forms do not.
14-16	Semi-lithified calc ooze	0.2	A	-	-	—			-	-	Worm burrows noted. Massive character.
2,10,11,12	Layered unknown	0.3	A	-	-	—			-	-	Does not react with HCL, layered morphology. Some chert?
1,(3-5), 8, 13, 120, 132	Layered unknown	0.7	A	-	-	—		0.2	-	-	Does not react with HCL, layered morphology. Some chert? Mn-stain on both sides.
7, 159, 160, 166	Magnetite (erratics)	2.9	A	-	10-12% white, secondary mineral grains.	—		0.1	L	-	Some small crack infilling occurs. Magnetic erratic.
6, 161, 165, 167, 168, 173, 175	Altered peridotite?	2.9	A	-	3% altered Px?	—		TR	VH	Px? to green "gemmy" serp.	Moderately veined by secondary calcite. Much of the original groundmass has gone to clay.
unlabeled	Coral fragments	0.9	-	-	-	—			-	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 14 DREDGE 14 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
14-1	Coral fragments	0.3	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 15 DREDGE 15 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
	GROUP I										
15-1, 3, 5, 6, 7	Serpentinite	0.6	A	Serpentine.	-				H	Serpentinized.	Dun colored fragments.
15-2, 4	Serpentinite	0.1	A	Serpentine.	-				H	Serpentinized.	Mylonized, black serpentine.
	GROUP II										
15-(1-5)	Coral fragments	2.0	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 16 DREDGE 16 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
	Group I										
16-(1-3), 14, 15	Coral fragments	3.6	-	-	-					-	-
	Group II										
16-(1-3)	Serpentinite	0.1	A	Serpentine.	-				H	Serpentinized.	Dun colored.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 17 DREDGE 17 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/22/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
	GROUP I										
17-(1-3)	Serpentinite?	-	-	-	-				H	Serpentinized.	Mylonized.
17-4	Coral	0.2	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/P. Andrew DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
NOTE:	SAMPLE WEIGHTS	ARE	GROUPED AND LOGGED		AT END OF SAMPLE DESCRIPTION.					(SEE PAGE # 218)	
2	Serpentinite	-	C	Serpentine.	-					-	Abundant oxides noted.
3	"	-	-	"	-					-	-
4	"	-	-	"	-					-	-
5	"	-	-	"	-					-	-
6	Dunite	-	-	Olivine.	-					-	-
7	Serpentinite	-	-	Serpentine.	-					-	-
8	"	-	-	"	-					-	-
9	"	-	-	"	-					-	-
10	"	-	-	"	-					-	-
11	Dunite	-	-	Olivine.	-				H	~20% Serpentine.	Mylonization apparent, along with Mn-oxide.
12	"	-	-	"	-					-	-
13	Serpentinite	-	-	Serpentine.	-					-	Abundant white mineral grains noted.
14	"	-	-	"	-					-	-
15	"	-	-	"	-					-	-
16	Pebble rich Sandstone	-	-	Calcareous Matrix.	Weathered dunite clasts.					-	-
17	Serpentinite	-	-	Serpentine.	-					-	-
18	"	-	-	"	-				F	-	Angular morphology.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19	Serpentinite	-	-	-	-				L	-	Rounded sample, mylotonized and exhibiting calcite veins.
20	"	-	-	-	-				H	-	Sample is slightly rounded.
21	"	-	-	-	-				H	-	Rounded sample containing large calcite vein. Worm tubes noted.
22	"	-	-	-	-				H	-	Sample rounded and exhibits abundant calcite veining.
23	Dunite	-	-	Olivine.	-				L	<20% Ol. to Serp.	Mylonitization noted, slightly rounded sample.
24	"	-	-	"	-				F	~30% Ol. to Serp.	Rounded sample containing abundant sulfide and serpentine veins. Mylonitization and worm tubes noted.
25	Serpentinite	-	-	-	-				M	-	Mylonitization present along with a thin calcite coating. Sample also rounded.
26	Dunite	-	-	Olivine.	-				M	<5% Ol. to Serp.	Rounded sample exhibiting microfolds and compositional layering. Mylonitization and weathering rind also noted.
27	Dunite	-	-	Olivine.	Abundant Spinel.				M	-	Weathering rind notable.
35	Dunite (Light Grey)	-	-	"	-				F	<20% Ol. to Serp.	Angular to slightly rounded samples, mylonized and later cut by serpentine veins. Coral bases and worm tubes are common.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
*	The following samples are similar to #35: #31, #33-#37, #40, #42, #43, #45, #46, #48, #49, #63,										
	#65-69, #71-78, #80-86, #91, #93, #94, #95, #97, #98, #101, #104, #106, #107, #111, #113, #121, #123,										
	#129, #130, #132, #136, #140, #144, #145, #146, #149, #150, #152, #155, #156, #160, #164, #165, #167,										
	#170, #171, #176, #177, #178, #188, #190-196, #198, #200, #201, #206, #208, #209, #217, #221, #230,										
	#234, #242, #243, #245, #248, #252, #253, #255, #261, #266, #267, #268, #269, #272, #279, #283, #290,										
	#294, #297, #299, #303, #304, #305, #308, #312, #314, #316, #317, #319, #321, #323, #327, #328, #329,										
	#337, #342, #344, #345, #347, #349, #351, #354, #357-360, #362, #367, #373, #374, #376, #379, #381,										
	#384, #388, #389, #390, #398, #400, #402, #403, #404, #407, #414, #417, #418, #421, #425, #426, #427,										
	#429, #430, #434, #438, #440, #442, #444, #447, #453, #455, #456, #461, #470, #471, #472, #478, #480,										
	#486, #488, #607, #625, #634, #635, #636, #638, #647, #649, #650, #653, #654, #661, #665, #675, #679,										
	#685, #688, #690, #698, #701, #712, #714, #715, #718-723, #726, #727, #728, #730, #731, #732, #739,										
	#740, #742, #743, #748, #752, #754-758, #761, #762, #763, #765, #767, #770, #771, #773, #775, #776,										
	#777, #785, #787, #800, #802, #804, #805, #807, #812, #818, #819, #823, #824, #829, #830, #834, #838,										
	#839, #840, #842, #845, #854, #863, #867, #879, #888, #891, #893, #894, #910, #912, #920, #921, #926,										
	#412, #550, #657, #695, #792, #809, #855, and #900.										
60	Serpentinite	-	-	-	-				F	>50% Ol. to Serp.	Angular to subangular samples, mylonized, and exhibiting scattered worm tubes.
*	The following samples are similar to #60: #28, #29, #30, #35, #38, #39, #41, #44, #47, #50-59, #61,										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
	(Continued)										
	#62, #64, #70, #79, #87-90, #92, #96, #99, #100, #102, #103, #105, #108, #109, #110, #112, #114, #115,										
	#116, #118, #119, #120, #122, #124-128, #131, #133, #134, #135, #137, #138, #139, #141, #143, #147, #148,										
	#151, #153, #154, #157, #158, #159, #161, #162, #163, #166, #169, #172-175, #179-187, #189, #197, #199,										
	#202-205, #207, #210-216, #218, #219, #220, #222-229, #231, #232, #233, #235, #237-241, #244, #247, #249,										
	#250, #251, #254, #256-260, #262-265, #270-278, #280, #281, #282, #284-287, #289, #291, #292, #293, #295,										
	#296, #298, #300, #301, #302, #306, #307, #309, #310, #311, #313, #315, #318, #320, #322, #325, #330-336,										
	#338-341, #343, #346, #348, #350, #352, #353, #355, #356, #361, #363-366, #368-372, #375, #377, #378, #380,										
	#382, #383, #385, #386, #387, #391-397, #399, #401, #405, #408-411, #415, #416, #419, #420, #422, #423, #424,										
	#428, #431, #436-439, #441, #443, #445, #446, #448-452, #457-460, #462-469, #473, #474, #475, #477, #479,										
	#481-485, #487, #489, #519, #572, #601, #602, #605, #611, #613, #615, #616, #618, #626-633, #637, #640, #642,										
	#645, #646, #648, #651, #652, #655, #656, #658, #659, #660, #662, #663, #664, #666, #667, #669, #670, #671,										
	#673, #674, #676, #677, #678, #680-684, #686, #687, #689, #691, #692, #694, #696, #697, #700, #702-705,										
	#707-711, #716, #724, #725, #729, #733-738, #741, #744-747, #749, #751, #753, #759, #760, #763, #764, #772,										
	#774, #778, #780-784, #786, #789, #790, #791, #793-799, #801, #805, #808, #815, #820, #828, #831, #832, #833,										
	#837, #843, #844, #846, #849, #850, #852, #856, #860, #861, #864, #865, #866, #870, #871, #872, #874-878,										
	#880, #884-887, #890, #892, #896-899, #901-909, #911, #913-916, #918, #919, #922, #923, #924, #963, and										
	#14, #22.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/P. Andrew DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
246	Serpentinite	-	-	Serpentine.	-				F	-	Clear "gemmy" vein of serpentine. Pyrite and oxide noted.
326	Serpentinite	-	-	Serpentine.	-				F	-	Abundant oxide and calcite noted.
571	Dunite	-	-	Olivine.	-				F	<5% Serpentine.	Mylonized, foliated and slightly rounded.
594	"	-	-	"	-				F	Serpentinized.	Mylonized and weathered dark grey. Worm tubes noted.
*	The following samples are similar to #594 as described above: #490, #491, #493, #494, #496, #500, #505-509, #514-516, #521, #522, #524, #526-531, #535-547, #549, #551, #553, #555-560, #562-566, #568-570, #573-575, #577, #580-584, #586, #587, #589, #590, #592, #593, #596, #597, #603, #604, #606, #610, #614, and #619-621.										
598	Dunite	-	-	Olivine.	-				F	<5% Ol. to Serp.	Mylonized. Worm tubes noted. Samples weathered grey.
*	The following samples are similar to #598 as described above: #492, #501, #503, #510, #548, #578, #579, #591, #609, and #622.										
608	Serpentinite	-	-	Serpentine.	-				F	-	Mylonized, angular fragment with worm tubes.
*	The following samples are similar to #608 as described above: #495, #497-499, #502, #504, #511-513, #517, #518, #520, #523, #525, #527, #532-534, #554, #567, #595, #599, #612, and #600.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/P. Andrew DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
617	Dunite	-	-	-	-				M	5% Ol. to Serp.	Mylonized, foliated, and angular in shape.
623	"	-	-	Olivine.	-				H	Serpentinized.	Mylonized. *Similar samples #576 and #623.
634	Serpentinite	-	-	Serpentine.	-				F	60% Serp.	Vein of white mineral grains noted.
644	Missing	-	-	-	-	-	-	-	-	-	-
699	Dunite	-	-	Olivine.	Abundant Malachite (?).				F	<5% Ol. to Serp.	Sample exhibits abundant Cu. sulfide grains in a very light grey mylonized matrix.
750	Serpentinite	-	-	Serpentine.	-				F	-	Angular fragment exhibiting a thick oxide seam.
788	Dunite	-	M	Olivine.	-				F	<5% Ol. to Serp.	Slightly rounded, mylonized sample.
811	Dunite	-	-	-	-				M	<5% Ol. to Serp.	Samples exhibit weathering rind and buff. A few samples contain rare coral bases and worm tubes.
*	The following samples are similar to #811: #624, #639, #641, #668, #672, #713, #717, #779, #803,										
	#810, #813, #821, #822, #825, #826, #835, #836, #841, #847, #848, #851, #853, #858, #859, #882,										
	#883, and #817, #868, #869, #873, #881, and #925.										
814	Dunite	-	-	Olivine.	-				F	<5% Ol. to Serp.	Rounded, mylonized sample.
816	"	-	-	"	-				F	<5% Ol. to Serp.	Slightly rounded ultra-mylonite.
857	"	-	-	"	-				F	<5% Ol. to Serp.	Sample contains brown spinel and is mylonized and foliated.
862	Dunite	-	-	Olivine.	-				F	-	Angular, mylonized fragment exhibiting compositional layering.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 18 DREDGE 18 DESCRIBED BY G. Thompson/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
895	Serpentinite	-	-	Serpentine	-				F	-	Rounded sample containing an abundant white mineral.
unlabeled	Calcareous Ooze	4.0	-	-	-					-	3 - 1/2 gallon jars.
2 drawers unlabeled fragments		28.0	-	Boxes contain assorted samples of mylonized, phosphatized, serpentinized rock fragments, and dunite.							
SAMPLE #'s	COMBINED WEIGHT OF SAMPLES:				DREDGE 18						
1 - 29		33.0	kg								
30 - 159		23.0	kg								
160 - 319		13.0	kg								
320 - 479		16.0	kg								
480 - 639		16.5	kg								
640 - 799		18.0	kg								
800 - 926		23.0	kg								

WHOI ROCK SAMPLE DESCRIPTION

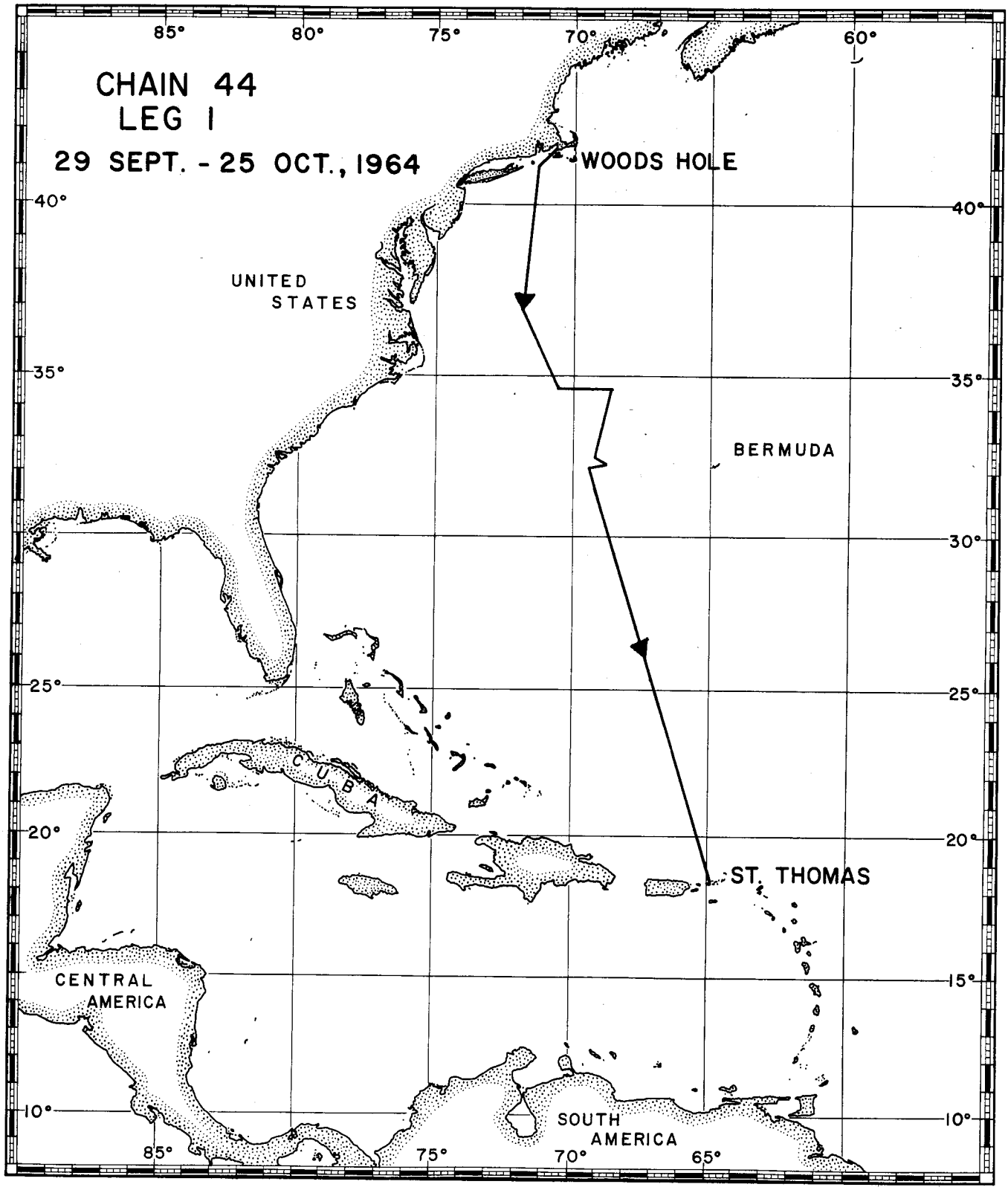
CRUISE CHN 35 STATION 19 DREDGE 19 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1-7)	Calcareous Ooze	35.0	F	-	-					-	Rich in forams. Slightly silty.
-	Calcareous Ooze	2.0	<62μ	-	-					-	No forams notable.
		STATION	21	DREDGE 21							DATE 6/25/85
-	1 pint jar - Sand with shell fragments	1.0	M	-	-					-	-
		STATION	24	DREDGE 24							DATE 6/25/85
-	4 pint jars - sand with shell fragments	4.0	M	-	-					-	-
		STATION	29	DREDGE 29							DATE 6/25/85
1	Calc-ooze with abundant coarse shells	30	A	-	-					-	-
		STATION	34	DREDGE 34							DATE 6/25/85
-	Calcareous ooze	0.5	F	-	-					-	1/2 pint jar, with forams.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 35 STATION 42 DREDGE 42 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/25/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
-	Coarse sand with shell fragments	0.5	C	-	-					-	-
		STATION	47		DREDGE 47						
-	Sandy, shelly calcareous ooze	12.0	C	-	-					-	5-1/2 gallon buckets.
		STATION	48		DREDGE 48						
-	Slightly silty clay	1.8	-	-	-					-	1-1/2 gallon bucket.
		STATION	49		DREDGE 49						
-	Large bag of calc-ooze with shell fragments	30.0	-	-	-					-	-
		STATION	51		DREDGE 51						
-	Green clay (Pelagic)	12.0	-	-	-					-	2 - 1 gallon jars.


CHAIN 44
LEG 1
29 SEPT. - 25 OCT., 1964
WOODS HOLE
ST. THOMAS
BERMUDA
UNITED STATES
CUBA
CENTRAL AMERICA
SOUTH AMERICA
85°
80°
75°
70°
60°
65°
40°
35°
30°
25°
20°
15°
10°

********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
CHN	44	1	0002	0000	8	641014	22 38.0'N	44 58.0'W	1	77.24	0002	2440.	2100.	008K	15	0000	0	
CHN	44	1	0003	0000	8	641014	22 38.0'N	45 0.7'W	1	77.25	0003	3400.	2400.	111K	15	0000	0	
CHN	44	1	0005	0000	8	641014	22 48.3'N	45 38.2'W	1	77.25	0005	3150.	3050.	011K	15	0000	0	
CHN	44	1	0006	0000	7	641017	22 46.8'N	46 10.8'W	1	77.25	0006	4400.	4100.	011K	15	0000	0	
CHN	44	1	0007	0000	7	641017	22 48.8'N	46 5.3'W	1	77.26	0007	4040.	3765.	001K	15	0000	0	
CHN	44	1	0008	0000	7	641018	22 50.0'N	45 5.6'W	1	77.25	0008	3400.	3200.	010K	15	0000	0	
CHN	44	1	0010	0000	7	641020	22 24.2'N	46 22.8'W	1	77.26	0010	3400.	3100.	010K	15	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 2 DREDGE 2 DESCRIBED BY Paul Andrew/Van Andel DATE 12/10/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	268	F	-	M-Grained Pg.	1%	-	TR	L	TR of palagonitized glass.	-
2	"	55	F	-	-	1%	-	TR	L	-	-
3	"	190	F	-	-	2%	TR	0.1	M	1cm weathering rind.	Worm tubes?
4	Greenstone	93	A	-	-	——	——	0.1	L	-	-
5	"	24	A	-	-	——	——	0.1	L	-	-
6	Lapilli Tuff	63	C	-	-	——	——	0.1	L	-	Composed of sub-angular clasts of basalt.
7	MISSING										
8	Basalt	183	A	-	M-Grained Pg.	2%	-	0.1	L	TR of palagonitized glass.	-
9	"	202	A	-	M-Grained Pg.	2%	-	TR	L	-	-
10	Metabasalt	133	F	-	-	——	——	0.3	L	Gr.	With metallic (sulfide?) inclusions.
11	"	38	F	-	M-Grained Pg.	——	——	0.3	-	Gr.	Completely coated with Mn.
12	"	77	F	-	Pg.	TR	-	0.1	L	Gr.	-
13	Greenstone	41	A	-	-	——	——	0.3	-	-	Completely coated with Mn.
14	"	40	A	-	-	——	——	TR	L	Gr.	Metabasalt?
15	"	35	A	-	-	——	——	0.1	L	Gr.	-
16	Lapilli Tuff	25	C	-	-	——	——	0.1	L	Gr.	Cemented volcanic ejecta (now greenstone).
17	Basalt	35	F	-	M-Grained Pg.	1%	-	0.1	L	-	-
18	"	40	A	-	-	2%	-	1.1	L	-	Partially coated with sediment.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 2 DREDGE 2 DESCRIBED BY Paul Andrew/Van Andel DATE 12/10/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19	Greenstone	30	A	-	-	——		0.1	L	Gr.	Completely coated with Mn.
20	"	30	A	-	-	——		0.1	L	Gr.	"
21	"	10	A	-	-	——		0.1	L	Gr.	"
22	Lapilli tuff	5	C	-	-	——		0.1	L	Gr.	Greenstone.
23	Basalt	10	F	-	M-Grained Pg.	2%	-	0.1	L	-	-
24	"	5	F	-	-	——		0.1	M	-	"Spot" weathering throughout.
25	Greenstone	10	A	-	-	——		0.1	L	Gr.	-
26	Basalt	5	F	-	M-Grained Pg.	——		0.1	M	-	-
27	Greenstone	5	A	-	-	——		0.1	L	Gr.	-
28	Lapilli tuff	5	C	-	-	——		0.1	L	Gr.	Greenstone.
29	Basalt	10	F	-	M-Grained Pg.	2%	-	0.1	M	-	∿1cm weathering rind.
30	Greenstone	5	F	-	-	——		0.1	L	-	Plag. veins throughout.
32	"	5	F	-	-	——		0.1	L	-	-
33	Basalt	10	F	-	C-laths of Pg.	——		0.1	M	-	-
35	"	30	F	-	Some Pg.	——		0.1	L	-	-
36	Greenstone	10	A	-	-	——		0.1	L	Gr.	-
84	Basalt fragments	-	-	-	-	——		——	——	-	-
85	Greenstone	68	A	-	-	——		0.1	L	Gr.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 2 DREDGE 2 DESCRIBED BY Paul Andrew/Van Andel DATE 12/10/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
86	Greenstone	75	A	-	-	——		0.1	L	Gr.	-
87	"	15	A	-	-	——		TR	L	Gr.	Plag. veins throughout.
(88 - 91)	"	10	A	-	-	——		TR	L	Gr.	-
(106 - 113)	Lapilli tuff	-	C	-	-	——		TR	L	Gr.	Greenstone.
114	Basalt	40	F	-	M-Grained Pg.	2%	-	0.1	L	-	Thin glassy rind.
115	"	40	F	-	"	2%	-	0.1	L	-	-
116	Greenstone	10	F	-	-	——			L	-	Sediment coated.
117	Basalt tuff	5	M	-	-	——		TR	H	-	Very weathered.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 3 DREDGE 3 DESCRIBED BY Paul Andrew/Van Andel DATE 12/11/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Lapilli tuff	110	C	-	-			TR	L	Gr.	Cemented greenstone fragments.
2	Greenstone tuff	55	M	-	-			TR	L	Gr.	-
(3 - 4)	Greenstone	10	F	-	-				L	Gr.	-
5	Greenstone tuff	2	M	-	-				M	Gr.	-
6	"	420	M	-	-			TR	L	Gr.	Sediment coating.
8	Greenstone	10	A	-	M-Grained Pg.			0.1	L	Gr.	Metabasalt?
9	"	110	F	-	-			TR	L	Gr.	-
10	Gabbro	5	C	-	C-Grained Plag.			TR	L	-	± Pyroxene?
11	Lapilli tuff	30	C	-	-			TR	L	Gr.	Cemented greenstone fragments.
12	Greenstone	50	A	-	-			0.1	L	Gr.	-
13	Greenstone tuff	30	M	-	-			TR	L	Gr.	-
14	Greenstone	30	F	-	Some Pg.			TR	L	Gr.	Highly fractured and veined.
15	"	30	F	-	-			TR	L	Gr.	Highly fractured.
16	Greenstone tuff	30	M	-	-			TR	L	Gr.	-
17	"	15	M	-	-				L	Gr.	-
18	Lapilli tuff	80	C	-	-			TR	L	Gr.	Cemented greenstone fragments.
19	Greenstone	10	F	-	-				L	Gr.	-
20	"	15	F	-	-			0.1	L	Gr.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 3 DREDGE 3 DESCRIBED BY Paul Andrew/Van Andel DATE 12/11/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
21	Greenstone	15	F	-	-	—	—	—	L	Gr.	Some plag. veins.
22	Lapilli tuff	5	C	-	-	—	—	0.1	L	Gr.	Greenstone clasts.
23	Greenstone	5	F	-	-	—	—	—	L	Gr.	-
24	Greenstone tuff	5	M	-	Some large Pg grains.	—	—	TR	L	Gr.	-
25	Lapilli tuff	10	C	-	-	—	—	TR	L	Gr.	Fractured clasts of greenstone.
26	Greenstone	15	F	-	-	—	—	TR	L	Gr.	-
27	Metabasalt	5	F	-	Some M-grained Pg.	—	—	0.1	L	Gr.	
28	Greenstone	5	F	-	-	—	—	0.1	L	Gr.	Highly fractured and veined.
29	Metabasalt	5	F	-	-	—	—	0.1	L	Gr.	
30	Greenstone	3	F	-	-	—	—	TR	L	Gr.	-
31	Basalt	3	F	-	Med-grained Pg.	—	—	0.1	L	-	-
32	Basalt	3	F	-	-	—	—	TR	L	-	-

		STATION:	6	DREDGE: 6						DATE 12/11/84
1	Basalt	500	F	-	M-Grained Pg.	1%	TR	15	M	Some palagonite.	~1cm weathering rind. Abundant Mn-crusting.
2	Foram Ooze	-	-	-	-	—	—	—	—	-	Has been sieved.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 7 DREDGE 7 DESCRIBED BY Paul Andrew/Van Andel DATE 12/11/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Foram ooze	-	-	-	-					-	Sieved sediment.

WHOI ROCK SAMPLE DESCRIPTION

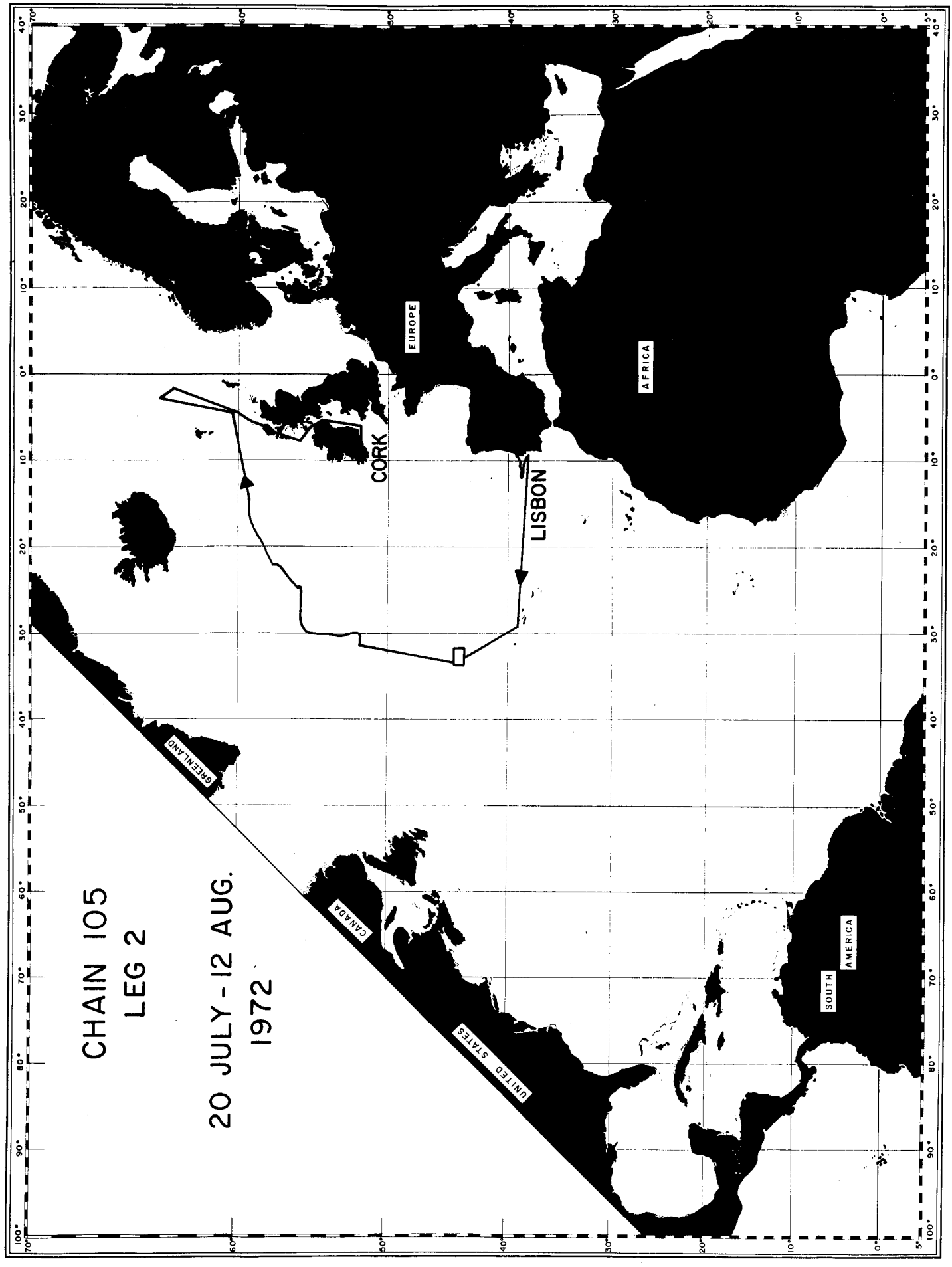
CRUISE CHN 44 STATION 8 DREDGE 8 DESCRIBED BY Paul Andrew/Van Andel DATE 12/11/84

Sample #	Lithology	Wt(g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	100	F	-	Med-grained Pg.	TR	-	0.1	L	Glass to palagonite.	All specimens coated with Mn.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 44 STATION 10 DREDGE 10 DESCRIBED BY Paul Andrew/Van Andel DATE 12/11/84

Sample #	Lithology	Wt (g)	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	-	F	-	-	——		15	M	Glass to palagonite.	Thick Mn-crusts.


CHAIN 105
LEG 2
20 JULY - 12 AUG.
1972
CORK
LISBON
EUROPE
AFRICA
GREENLAND
CANADA
UNITED STATES
SOUTH AMERICA

********** STATION DATA RETRIEVAL **********
********** DATE: 8-DEC-86 14:40 **********

SHIP	CRUISE LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
CHN 105	2	0001	0000	8	72 726	43 52.0'N	22 13.6'W	9	147.32	0001	4528.	4106.	010K	17	0000	0	
CHN 105	2	0003	0000	8	72 726	43 58.2'N	22 11.7'W	9	147.32	0003	3118.	2625.	021K	17	0000	0	
CHN 105	2	0005	0000	8	72 727	43 38.8'N	22 6.0'W	9	147.32	0005	4528.	3764.	013K	17	0000	0	
CHN 105	2	0006	0000	8	72 727	43 39.0'N	22 13.0'W	9	147.32	0006	3080.	2530.	044K	17	0000	0	
CHN 105	2	0007	0000	8	72 727	43 35.7'N	22 27.2'W	9	147.32	0007	1727.	1316.	005K	17	0000	0	
CHN 105	2	0008	0000	8	72 727	43 21.0'N	21 19.1'W	9	147.31	0008	4299.	3953.	012K	17	0000	0	
CHN 105	2	0009	0000	8	72 729	43 18.1'N	21 38.1'W	9	147.31	0009	4278.	3457.	002K	17	0000	0	
CHN 105	2	0010	0000	8	72 728	43 17.2'N	21 46.9'W	9	147.31	0010	2967.	2626.	004K	17	0000	0	
CHN 105	2	0011	0000	8	72 729	43 36.7'N	22 28.2'W	9	147.32	0011	1614.	1129.	008K	17	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 1 DREDGE 1 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Suspended Sediment	5g	-	-	-	—	—	—	—	-	Drawn from pipe dredge.
(2 - 3)	Foram Clay	1	-	-	-	—	—	—	—	-	-
4	Altered Basalt/ clay	5g	-	-	-	—	—	—	H	-	Scraping from dredge jaws.
5	Basalt Fe-Mn Crust	5g	-	-	-	—	—	TR	L	-	~10 (0.5-1.5 cm dia.) pebbles.
6	Vesicular Basalt	6kg	-	-	-	15%	-	0.5	M	Notable alteration of rims.	Fresh center. Clay infilled cracks.
7	"	3kg	-	-	-	10%	-	TR	M	Altered glass rims.	Less vesicular than No. 6. Clay infilled crack.
(8 - 10)	"	2kg tot.	-	-	-	15	-	0.5	M	-	Three rock samples. No fresh centers.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 2 DREDGE 2 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Coarse foram ooze	1g	-	-	-					-	With mineral and rock grains.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 3 DREDGE 3 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Sponge	-	-	-	-	—	—	—	—	-	Taken off sample #5.
2	Foram Ooze	0.2kg	-	-	-	—	—	—	—	-	Washings from pipe dredge.
3	Pipe dredge mélange	0.3kg	-	-	-	—	—	TR	-	-	Mixture of foram ooze, consolidated ooze and Fe-Mn crusts.
4	Main dredge mélange	50g	-	-	-	—	—	TR	-	-	Mixture of foram ooze, consolidated ooze and Fe-Mn crusts.
(5 - 10)	Consolidated ooze	12kg tot.	-	-	-	—	—	2	-	-	Burrowing. Six slabs total.
(11 - 12)	"	2kg	-	-	-	—	—	2	-	-	Many (∿1 lb.) pieces of consolidated ooze.
13	Vesicular Basalt	0.2kg	-	-	-	10%	-	2	M	-	Fe-Mn crust and consolidated ooze on surface.
14	Weathered Basalt	0.4kg	-	-	-	20%	-	1	M	-	Very large vesicles with consolidated ooze infillings.
15	Weathered Basalt	0.2kg	-	-	-	1%	-	4	VH	to palagonite.	-
16	Vesicular Basalt	0.8kg	-	-	-	10%	-	1	M	-	Thick Fe-Mn crust. Some consolidated ooze.
17	Lithified ooze fragments	0.6kg	-	-	-	—	—	1	-	Lithified.	Similar to Sample 5.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 4 DREDGE 4 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Foram Clay	0.2kg	-	-	-					-	Plastic texture.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 5 DREDGE 5 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Foram-rich Clay	5.0	-	-	-					-	Some rock and mineral fragments. From pipe dredge.
2	"	2.5	-	-	-					-	Many rock and mineral fragments. From main dredge.
3	Basalt	4.5	VF	-	TR - Pg.			TR	L	-	Some infilled cracks.
4	Gabbro	4.5	M	-	Large Pg laths.			TR	L	-	-
5	Basalt	1.0	F	-	Pg laths.			0.1	L	-	-
6	"	0.7	F	-	-			0.1	L	-	Slightly metamorphosed (?), with green infillings.
7	Metabasalt	0.4	C	-	Large Pg laths.			0.1	L	-	-
8	Gabbro	0.7	M	-	Notable Pg.			0.1	L		Very light color.
9	Gabbro	0.4	C	-	-			TR	L	-	-
10	"	0.4	C	-	Amphibole laths.			0.1	L	-	Richer in dark minerals than sample #9.
11	"	0.2	C	-	-			TR	L	-	"
12	"	0.6	C	-	-			TR	M	-	Very dark color.
13	"	0.2	C	-	Pg laths.				L	-	-
14	"	0.4	C	-	-			TR	M		Very dark color.
15	Basalt/ Metabasalt	0.2	F	-	-			TR	L	alteration apparent.	-
(16 - 24)	Gabbro	1.5 tot.	C								9 samples total. Very dark color.
(25 - 35)	"	2.0	C	-	-					-	Eleven samples (total). Lighter gabbros than
											Sample #12. Similar to sample #9.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 5 DREDGE 5 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
36	Gabbro (?)	0.1	M	-	Notable Pg.	—	—	0.1	L	-	Very light gabbro.
37	Basalt	0.1	F	-	Pg laths.	—	—	—	L	-	-
38	"	0.1	F	-	"	—	—	—	L	-	-
39	Main dredge Mélange	9.0	-	-	-	—	—	—	—	-	Rock fragments (up to 0.1kg and sediment mixture.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 6 DREDGE 6 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Clay with forams	5.0	-	-	-					-	Some rock and mineral fragments.
2	Weathered Basalt	6.0	-	-	-			0.2	H	Altered tuff = weath. zone	Very slight Fe-Mn crusting.
3	Tuff/Metatuff	9.0	-	Few, large basalt fragments.	-			5.0	M	-	Thick Fe-Mn crust. Notable weathering.
4	Weathered Basalt	1.2	-	-	-	25%	-	2.0	H	-	Tuffaceous and massive zones. Some vesicles infilling.
5	Weathered Basalt	1.0	-	-	Large Pg.	30%	-	TR	M	-	Chilled margins, little Fe-Mn crusting.
6	Vesicular Basalt	0.8	F	-	-	40%	-	TR	L	-	Large vesicles noted, little Fe-Mn crusting.
7	"	0.6	F	-	-	30%	-	TR	L	-	Slightly less vesicular than Sample #6.
(8 - 21)	Weathered Basalt	10 tot.	-	-	-			1.0	H	-	Thick Fe-Mn crusts. 14 samples total.
(22 - 38)	"	8 tot.	-	-	-			TR	VH	-	17 samples total. Little to no Fe-Mn crust.
(39 - 40)	Vesicular Basalt	0.3	F	-	-	20%	-	TR	L	-	Large vesicles noted, little Fe-Mn crusting.
(41 - 42)	Weathered Basalt	0.3	-	-	-			TR	M	-	Tuff (?)
43	"	0.3	-	-	-				M	to palagonite.	-
44	Erratic	0.3	-	-	-			TR	L	-	Siliceous - metamorphic.
45	Basalt Fragments	1.0	-	-	-			TR	M	-	Fragments up to 4 oz. in weight.
46	Erratic	2.0	-	-	-			TR	L	-	Small pebble sized siliceous erratic.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 7 DREDGE 7 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Altered Basalt	1.4	-	-	Some Pg.	—	—	0.1	L	Notable.	Vein infilling. Thin Mn-Fe crusts.
2	Shale	1.2	F	-	-	—	—	—	—	-	Slickensides. With fissle.
3	Lithified mud-stone/carbonate	0.5	-	-	-	—	—	—	—	-	Burrows noted.
4	Coral stem matrix	2.0	-	-	-	—	—	TR	-	-	Burrows noted, Fe-Mn staining.
(5 - 7)	"	1.0 tot.	-	-	-	—	—	TR	-	-	3 samples total. Like Sample #4.
8	Fan coral	0.2	-	-	-	—	—	—	—	-	Fan shaped, one individual.
9	Branched coral	0.1	-	-	-	—	—	TR	-	-	TR Fe-Mn.
10	"	0.1	-	-	-	—	—	TR	-	-	Fe-Mn stained.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 8 DREDGE 8 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Mud and rock fragments	0.5	-	-	-	—	—	—	—	-	Scraped from dredge shackle
2	Brecciated tuff	9.0	-	-	-	—	—	TR	M	Notably altered.	A few pieces vesicular basalt in tuff matrix.
3	Breccia	0.6	-	-	-	—	—	—	VH	Badly altered.	Friable.
4	Basalt	0.4	-	-	-	—	—	—	M	Notably altered.	-
5	Mudstone	0.6	-	-	-	—	—	0.1	L	-	Fe-Mn stained.
		STATION		9	DREDGE 9						
1	Foram clay	2.0	-	-	-	—	—	—	—	-	Small rock and mineral fragments.
2	Pebbles	5.0	-	-	-	—	—	TR	-	-	Fe-Mn stained.

WHOI ROCK SAMPLE DESCRIPTION

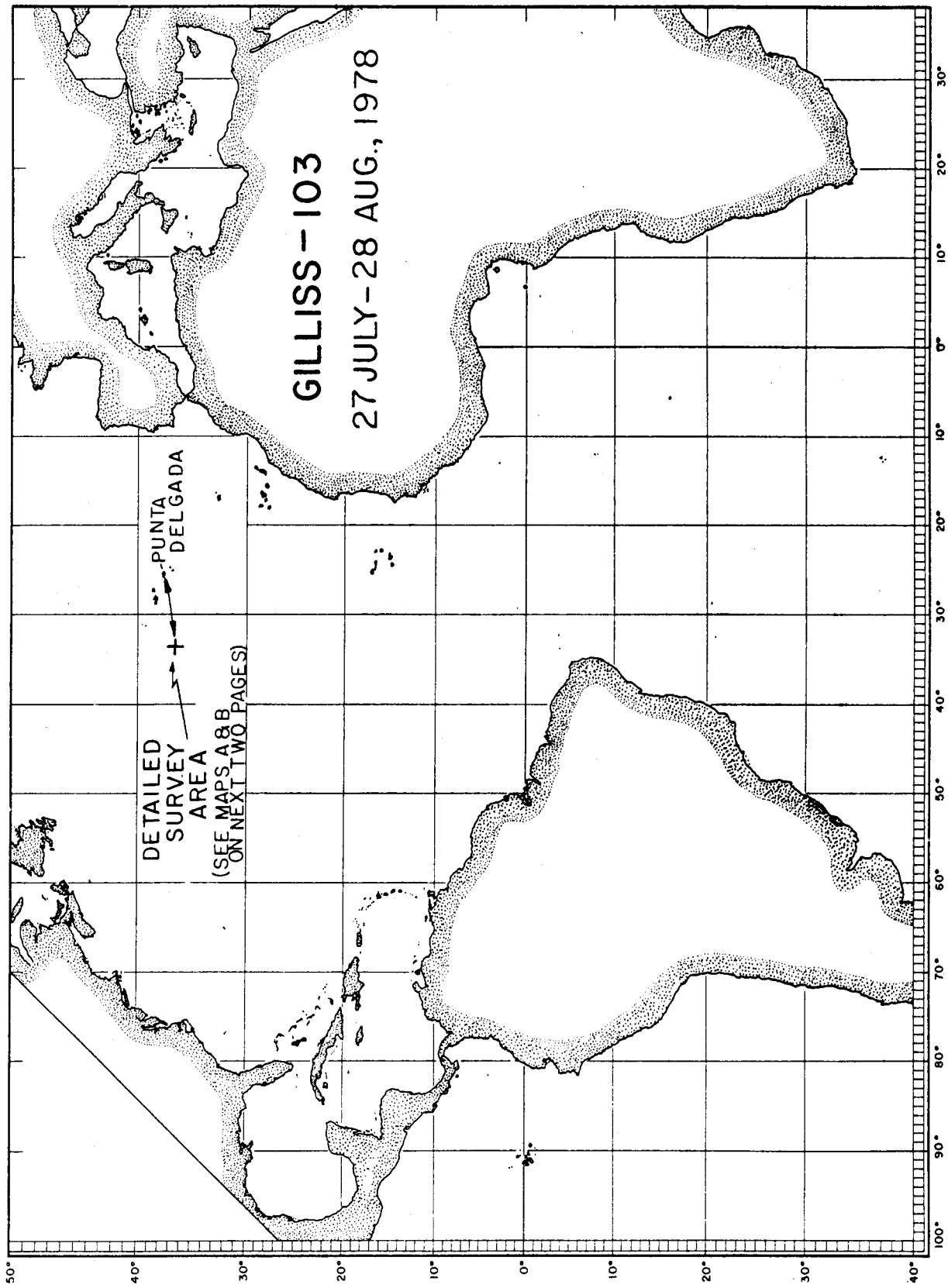
CRUISE CHN 105 STATION 10 DREDGE 10 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Clay with forams	4.0	-	-	-	-	-	-	-	-	Few noted rock fragments.
2	Small pebbles	2.0	-	-	-	-	-	TR	L	-	Largest one-0.5 gm.
3	Erratic	2.0	F	-	-	-	-	TR	L	Light center with dark	Two samples. Fe-Mn stained boulder, and siliceous
										outer zone.	boulder.
4	Metabasalt(?)	0.1	F	-	Plag. laths.	-	-	0.1	L	-	Fe-Mn stained.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE CHN 105 STATION 11 DREDGE 11 DESCRIBED BY G. Thompson/P. Andrew DATE 12/12/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Coarse foram rich sediment	2.0	C	-	Pteropods.					-	Many rock and mineral fragments.
2	Basalt	1.8	F	-	Abundant Pg.			0.1	L	-	Fe-Mn stained.
3	"	1.6	F	-	"			0.1	L	-	Some lith. carbonate noted.
4	Mudstone	0.1	F	-	-					-	With infilled burrow?
5	Basalt	0.1	F	-	-			TR	M	Badly altered.	May-be lith. sediment?
6	Erratic	0.2	-	-	-			0.1	L	-	Banded, siliceous.
7	Erratic	0.4	-	-	-			0.1	L	-	Siliceous, gneiss.
8	"	0.8	-	-	-			0.1	L	-	Banded, schistose.
9	"	0.4	-	-	-			0.1	L	-	"
10	Pebbles and rock fragments	0.2	-	-	-			TR	L	-	Large pebble - 4 oz.
11	Coral stems	0.1	-	-	-					-	Three stems.


GILLISS-103
27 JULY-28 AUG., 1978
PUNTA DELGADA
DETAILED SURVEY AREA
(SEE MAPS A & B ON NEXT TWO PAGES)
50°
40°
30°
20°
10°
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10°
20°
30°
40°
100°
90°
80°
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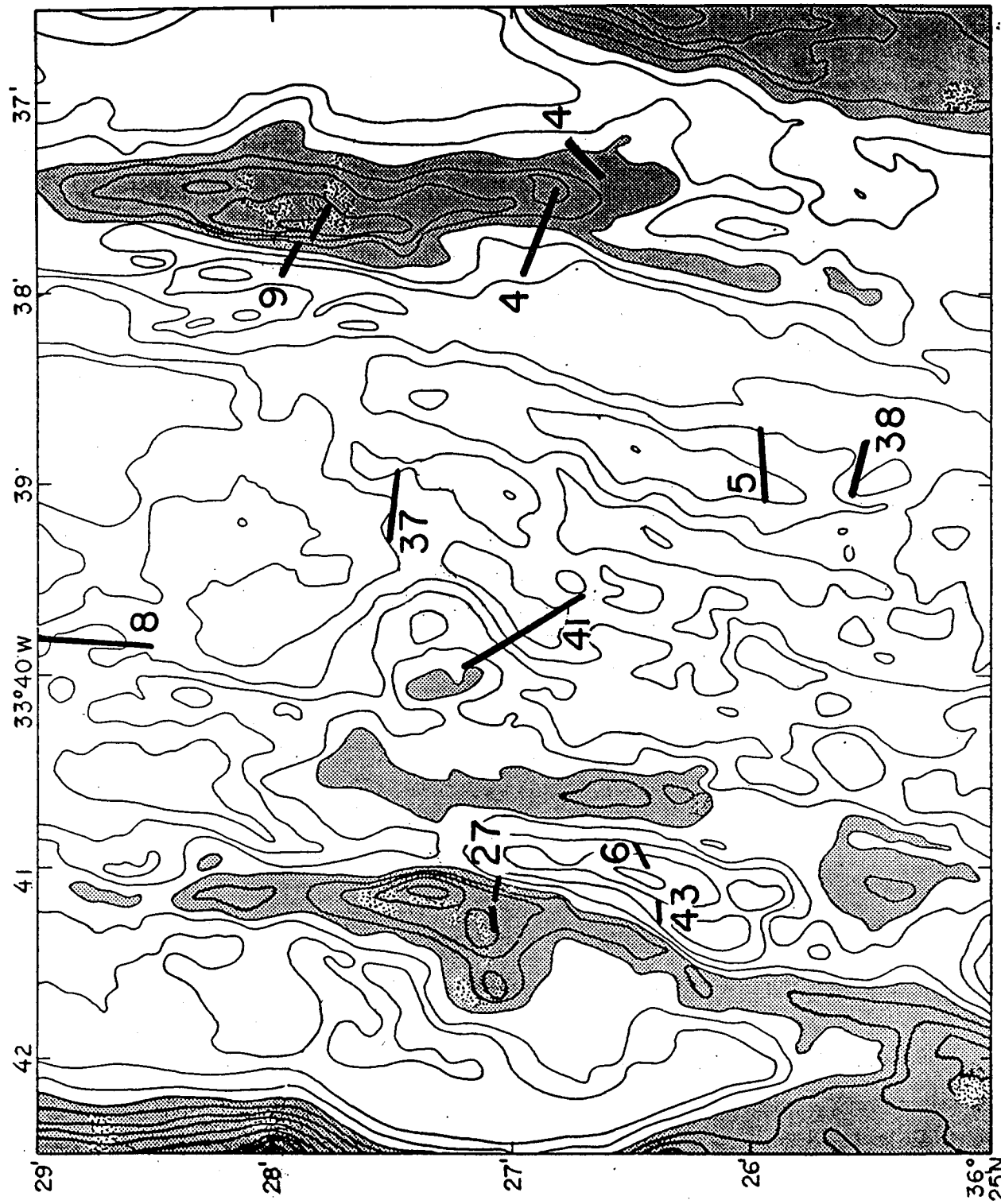
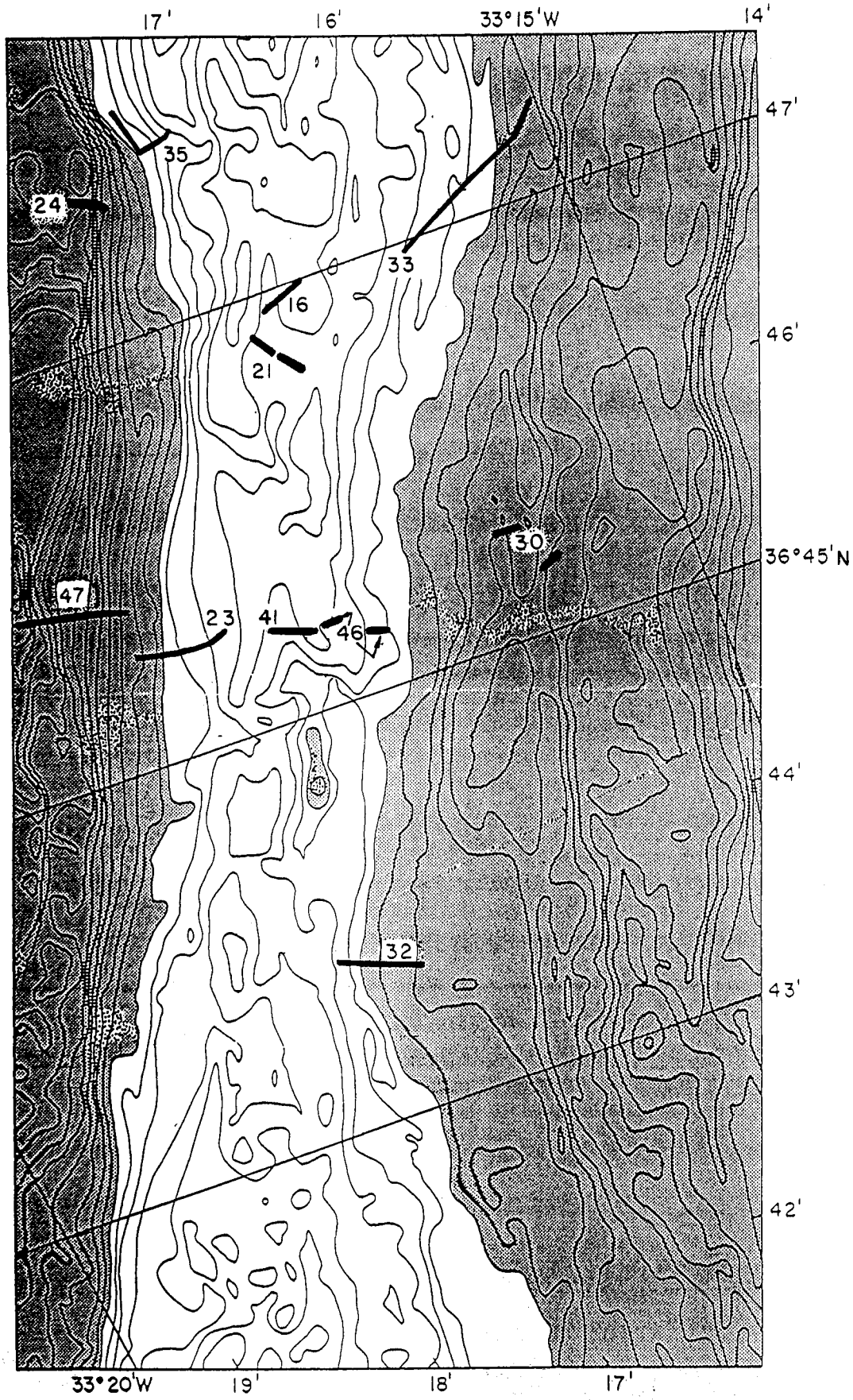


MAP A: DETAILED DREDGE SITES (G-103)



MAP B: DETAILED DREDGE SITES (G-103)

********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
GIL	103 1	0001	0000	8	78 729	36 47.6'N	33 18.3'W	9	112.63	0001	1968.	1968.	6K	16	0000	0	
GIL	103 1	0004	0000	8	78 8 1	36 26.6'N	33 37.6'W	11	112.63	0004	2615.	2440.	25K	16	0000	0	
GIL	103 1	0005	0000	8	78 8 2	36 25.7'N	33 38.9'W	11	112.63	0005	2627.	2551.	35K	16	0000	0	
GIL	103 1	0006	0000	8	78 8 2	36 26.5'N	33 41.0'W	11	112.63	0006	2400.	2400.	1K	16	0000	0	
GIL	103 1	0008	0000	8	78 8 3	36 28.9'N	33 40.0'W	11	112.63	0008	2485.	2477.	4K	16	0000	0	
GIL	103 1	0009	0000	8	78 8 4	36 27.8'N	33 37.8'W	11	112.63	0009	2590.	2230.	55K	16	0000	0	
GIL	103 1	0016	0000	8	78 813	36 46.8'N	33 16.7'W	11	112.63	0016	2617.	2617.	2K	16	0000	0	
GIL	103 1	0020	0000	8	78 815	36 46.4'N	33 17.3'W	11	112.63	0020	2694.	2694.	55K	16	0000	0	
GIL	103 1	0021	0000	8	78 816	36 46.5'N	33 16.6'W	11	112.63	0021	2627.	2589.	10K	16	0000	0	
GIL	103 1	0023	0000	8	78 816	36 45.5'N	33 17.5'W	11	112.63	0023	2532.	2203.	25K	16	0000	0	
GIL	103 1	0024	0000	8	78 817	36 47.6'N	33 17.4'W	11	112.63	0024	2484.	2250.	12K	16	0000	0	
GIL	103 1	0027	0000	8	78 817	36 27.1'N	33 40.9'W	11	112.63	0027	2231.	2276.	115K	16	0000	0	
GIL	103 1	0029	0000	8	78 818	36 47.1'N	33 16.5'W	11	112.63	0029	2523.	2523.		16	0000	0	
GIL	103 1	0030	0000	8	78 818	36 45.5'N	33 15.7'W	11	112.63	0030	2100.	2100.	15K	16	0000	0	
GIL	103 1	0032	0000	8	78 820	36 43.8'N	33 17.5'W	11	112.63	0032	2484.	2390.	160K	16	0000	0	
GIL	103 1	0033	0000	8	78 820	36 46.8'N	33 15.8'W	11	112.63	0033	2674.	2334.	200K	16	0000	0	
GIL	103 1	0035	0000	8	78 820	36 47.8'N	33 16.9'W	11	112.63	0035	2532.	2390.	80K	16	0000	0	
GIL	103 1	0037	0000	8	78 821	36 27.2'N	33 38.6'W	11	112.63	0037	2579.	2560.	20K	16	0000	0	
GIL	103 1	0038	0000	8	78 821	36 25.4'N	33 39.2'W	11	112.63	0038	2580.	2532.	30K	16	0000	0	
GIL	103 1	0041	0000	8	78 823	36 26.6'N	33 95.2'W	11	112.63	0041	2532.	2457.	7K	16	0000	0	
GIL	103 1	0043	0000	8	78 824	36 26.5'N	33 41.1'W	11	112.63	0043	2484.	2580.	4K	16	0000	0	
GIL	103 1	0046	0000	8	78 824	36 26.5'N	33 41.1'W	11	112.63	0046	2484.	2250.	35K	16	0000	0	
GIL	103 1	0047	0000	8	78 825	36 45.8'N	33 18.3'W	11	112.63	0047	2391.	1905.	210K	16	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 1 DREDGE 1 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	3.0	F	-	Noted Pg.	—		0.5	L	-	Sediment coated, no glass.
2	"	2.5	F	-	"	—		0.5	M	Glass to palagonite.	Glassy rind heavily coated with Mn. Some sediment.
3	Basalt	0.2	F	-	"	—		0.5	L	-	Attached Mn-coated coral. Pillow rind.
4	"	0.1	F	-	"	—		0.5	L	-	Pillow rind. Sediment coated. Worms on inside.
5	Basalt fragments	0.1	F	-	TR - Pg.	—		0.5	L	-	Three samples total. Attached animal.
7	Sediment	4.5	-	-	-	—				-	Sandy calc. – mud with included glass shards and bivalves.
				Editor's Note:	A.M.A.R. Team = Clifford Hopson,						
					Debra Stakes, H. Paul Johnson,						
					Nancy Gruver, Nicolas Walker and						
					John Pierce.						

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 4 DREDGE 4 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Consolidated Sediment	0.9	-	-	-	-	-	0.5	-	-	Noted Mn-crust on worm burrows.
2	Pillow Basalt	0.9	A	-	-	2%	-	0.5	M	Glass to palagonite.	-
3	"	1.0	F	-	Noted Pg.	2%	-	-	M	"	∿1mm of glass. Some sediment coating.
4	"	2.3	F	-	"	3%	-	0.1	L	"	∿1mm of glass.
5	"	8.2	F	-	Pg ?	1%	-	0.5	M	"	4mm-glass. Calc. mud under glass.
6	"	4.5	A	-	-	2%	-	0.1	L	"	Most glass broken off.
7	"	3.2	A	-	-	1%	-	1.0	L	"	1mm glass. Worm burrows noted.
9	"	0.3	F	-	10% Pg.	3%	-	-	L	"	7mm thick glassy rind.
10	Basalt	0.4	F	-	Noted Pg.	3%	-	0.1	L	-	Interior of pillow? Worm tubes.
11	Pillow Basalt	0.1	F	-	"	1%	-	-	L	Glass to palagonite.	0-1mm glass.
12	"	0.4	F	-	TR - Pg	X	-	-	L	"	0-1mm glass. Worm tubes noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 5 DREDGE 5 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	4.5	F	-	Minor Pg.	——		1.0	L	Glass to palagonite.	Very thin glassy margin.
2	Basalt	1.4	F	-	Noted Pg.	——		0.1	L	"	TR - glass with palagonite rim.
3	Pillow Basalt	1.8	F	-	Large (1cm) Pg laths.	——		<1	M	"	10mm glassy margin. Limonite
4	"	0.7	F	-	Round Pg grains.	——		——	M	"	10mm glassy margin.
5	"	0.7	F	-	10% Pg grains.	1%	-	0.1	M	"	5mm glassy rind, altered to palagonite and dusted with Mn.
6	Pillow Basalt	0.4	F	-	Noted Pg grains.	1%	-	0.1	M	Glass to palagonite.	3mm glass, covered with palagonite and Mn.
7	"	0.9	F	-	5% Pg grains.	1%	-	0.1	L	"	TR glass, covered with palagonite and Mn.
8	"	22	F	-	3% Pg.	TR	-	<1	L	"	5mm glassy rind.

		STATION: 6			DREDGE: 6						
1	Basalt	0.4	F	-	50% - Pg. TR - Ol.	1%	-	1	L	Glass to palagonite.	Small coral attached.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 7 DREDGE 7 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	44	F	-	Abundant large Pg.	TR	——		L	Glass to palagonite.	7mm thick glassy rim.

		STATION:	8	DREDGE: 8						DATE: 12/20/84
1	Pillow Basalt	3.6	F	-	Noted Pg.	TR	-	0.1	L	Glass to palagonite.	4mm glassy rind.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 9 DREDGE 9 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 7)	Pillow Basalt	1.6 tot.	F	-	Rare Pg.	TR	-	TR	L	Glass to palagonite.	Seven samples total. Most have 0-1mm glassy margins.
(8 - 12, 15, 16)	"	2.4 tot.	F	-	"	1%	-	TR	L	"	Seven samples total. Most have 0-2mm glassy margins.
(17 - 22, 24, 29)	"	1.4 tot.	F	-	Most samples have rare Pg.	TR	-	-	L	"	Eight samples total. Little to no glass. Some samples very vesicular.
(30 - 32), (35 - 39)	Pillow Basalt	2.0 tot.	F	-	Rare, large Pg.	TR	-	TR	L	Glass to palagonite.	Eight samples total. Little to no glass. Some samples very vesicular.
(40, 43, 48 - 51)	Pillow Basalt	0.7 tot.	F	-	Rare Pg.	TR	-	TR	L	Glass to palagonite.	Six samples total. Most samples have (0-1mm) glass.
13	"	1.1	A	-	-	TR	-	TR	L	"	0-3mm glassy rind. Limonite weathering.
14	"	0.5	F	-	Some Pg.	TR	-	TR	L	"	"
18	"	0.1	F	-	"	1%	-	0.5	L	-	Mud coating.
23	"	2.7	F	-	Rare Pg.	3%	-	0.1	L	Glass to palagonite.	0-1mm glassy rind. In two pieces - 23A and 23B.
25	"	5.5	F	-	"	TR	——		L	"	Remnant glassy margin.
26	"	13	A	-	-	TR	-	TR	L	"	Mud coating. Remnant glassy margin.
27	"	9	F	-	Noted Pg.	TR	-	0.1	M	"	0-2mm remnant glassy margin.
28	"	1.4	F	-	"	TR	-	TR	L	"	0-3mm remnant glassy margin. Mud coating.
33	"	3.2	A	-	-	1%	-	0.1	L	"	0-5mm glassy margin. Limonite discoloration.
34	"	5.5	-	-	Rare Pg.	1%	-	0.1	L	"	0-3mm glassy rind. Two fragments - 34 and 34A.
41	"	0.7	F	-	Very rare Pg.	TR	-	-	L	"	0-4mm glassy margin.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 9 DREDGE 9 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
42	Pillow Basalt	-	A	-	-	—	—	—	L	Glass to palagonite.	Old glass noted.
44	"	0.7	A	-	-	TR	-	0.1	L	"	0-2mm glassy margin.
45	"	1.4	F	-	Noted Pg.	3%	-	-	L	"	0-3mm glassy margin. Most glass gone.
46	"	1.4	F	-	Rare Pg.	2%	-	0.1	L	"	"
47	"	0.9	A	-	-	TR	-	-	L	"	"

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 16 DREDGE 16 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	1.4	F	-	Noted Pg.	TR	-	0.1	L	Glass to palagonite.	No glass, TR-palagonite.
2	"	0.9	F	-	Rare Pg.	2%	-	1/2	L	"	4mm glassy margin.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 20 DREDGE 20 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Plag-Phyric Pillow Basalt	35	F	-	Large Pg and medium grained Ol.	3%	-	0.1	L	Glass to palagonite.	1cm glassy rind in places.
2	Plag-Phyric Pillow Basalt	2.3	F	-	Large - Pg. Some Ol.	2%				-	1 cm glassy rind in places, very fresh.
3	"	3.6	F	-	Large (15mm) Pg. Small - Ol.	3%	-	0.1	L	Glass to palagonite.	Glass and palagonite margin.
4	Pillow Basalt	2.3	F	-	Pg and Ol.	1%	-	0.1	L	"	3mm glassy margin.
5	"	1.8	F	-	"	2%	-	0.1	L	"	2mm glassy margin, partiall altered to palagonite.
6	"	1.1	F	-	"	TR				-	4mm fresh glass.
7	"	0.5	F	-	Pg > Ol.	2%				Glass to palagonite.	2mm glassy rind. Some palagonite.
8	"	0.5	F	-	Pg and Ol.	3%	-	TR	L	"	Little glass. Talus fragments?

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 21 DREDGE 21 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/20/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	4.5	F	-	Very small Pg and Ol.	3%	-	0.1	M	Glass to palagonite.	Large vesicles. Little glass left, all pala-
											gonite.
2	Pillow Basalt	3.6	F	-	Sparse, large Pg.	3%	-	0.1	M	Glass to palagonite.	Large vesicles. 2mm of altered glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 23 DREDGE 23 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Phyric Basalt	13.3	A	-	∿2% large Pg and Ol.	1%	-	TR	L	-	Two samples total (A&B).
2	"	0.2	F	-	Large (2-10mm) Pg, Ol and Cpx.	3%	-	0.1	L	-	Four samples total (A-D). No glass.
3	"	4.5	F		∿10% large (1-4mm) sub-	12%	-	0.5	M	-	Two samples total (A&B). Some biological specimens.
					hedral Pg and Ol.						
4	Phyric Basalt	6.8	A	-	30% Pg, 10% Ol and 10% Cpx -	7%	-	0.2	H	-	Phenocrysts ∿2-7mm long.
					subhedral.						
6	Phyric Basalt	1.4	F	-	20% Pg, 15% Ol, 5% Px.	10%	-	0.1	H	-	Four samples total (A-D). Phenocrysts - subhedral,
											2-15mm long.
7	Basalt	0.2	F	-	1-2mm long Pg. ∿7%.	60%	X	0.1	M	-	Scoriaceous margin, ∿2cm wide with filled vesicles.
8	Phyric Basalt	5.0	A	-	1-4mm long Pg. ∿12%.	5%	-	0.1	M		Two samples total (A&B). Some fresh glass.
9	"	0.1	F	-	80% Pg, Ol 2mm-15mm long.	5%	-	0.1	M	-	Three samples total. Highly altered phenocrysts.
10	Vesicular Basalt	6.8	F	-	∿1-2% Pg and Ol, 3-5mm long.	10%	-	0.1	L	-	Two samples total. Subhedral altered phenocrysts.
11	Phyric Basalt	0.4	F	-	30% Pg, 15% Ol, 5% Cpx.	4%	-	0.1	L	-	Two samples total. Euhedral, 2-5mm long phenocrysts.
12	"	0.2	A	-	∿50% Pg, Ol & Cpx 2-10mm long.	3%	-	0.1	L	-	Two samples total (A&B). Fresh Cpx phenocrysts.
13	Vesicular Tholeiitic Basalt	4.0	A	-	∿2mm square Pg & Ol (<1%).	10%	-	0.5	L	-	Two samples total (A&B). 80% vesicles at scoria-
											ceous rim.
14	Aphyric-vesicular Basalt	-	A	-	-	15%	-	0.3	M	-	Two samples total (A&B). 2cm weathering rind noted,
											attached coral test.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 23 DREDGE 23 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15	Vesicular Basalt	4.0	A	-	~5% Pg, 1-3mm long.	10%	-	1	L	-	Two samples total (A&B), attached coral test.
16	Phyric Basalt	0.4	A	-	~50% Pg, 10% Ol & 5% Cpx.	8%	-	0.1	M	-	1-10mm long sub to euhedral phenocrysts.
17	Pillow Basalt	0.9	F	-	10% Pg, minor Ol.	15%	——		M	Glass to palagonite.	2-3mm weathered glass rind.
18	Phyric Basalt	0.2	A	-	~60% Pg, Ol and Cpx.	TR	-	TR	L	-	Two samples total (A&B), altered 1-7mm long phenocrysts.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 24 DREDGE 24 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Aphyric Basalt	2.3	A	-	-	1%	-	0.1	L	-	-
(2-4, 6-13, 16 - 21)	Basalt	6.5	A	-	Mostly aphyric, minor Pg & Ol.	TR	——		L	-	18 samples total. Talus? Angular fragments.
5	Aphyric Basalt	1.9	A	-	-	1%	-	TR	-	-	-
14	"	0.9	A	-	-	2%	——		L	Noted palagonite.	Talus fragment?
15	"	0.7	A	-	-	1%	-	0.1	L	-	Attached biological sample noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 27 DREDGE 27 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Plag. Phyric Pillow Basalt	35	F	-	∿30% Pg, minor Ol and Cpx.	TR	-	TR	L	Glass to palagonite.	0-8mm glass (altered), scoriaceous core.
2	Phyric Basalt	0.1	F	-	∿45% Pg, minor Ol and Cpx.	10%	—	—	L	"	Large vesicle in core. 2-3mm of glass.
3	"	0.9	A	-	∿40% Pg, minor Ol.	1%	—	—	L	"	Two samples total (A&B). 3-5mm of glass. Large vesicle composes core.
4	"	0.1	A	-	40% Pg, (Ol and Cpx)?	TR	—	—	L	Glass to palagonite.	4-7mm of glass. Glass is crenulated.
5	Basaltic Glass	0.1	A	-	-	—	—	—	L	"	-
6	"	0.1	A	-	Minor Pg.	TR	—	—	L	"	Covered with reddish crust.
7	Basalt	1.4	A	-	∿5% Pg, minor Ol and Cpx.	5%	—	—	L	"	2-4mm glassy rind. Jointed.
8	"	9.5	A	-	∿30% (2-4mm) long Pg.	4%	-	TR	M	"	2-3cm of glass. Biological specimen noted.
9	"	2.2	A	-	7% (Pg, Ol and Cpx).	7%	-	0.1	L	"	3-4mm of glass.
10	"	3.2	A	-	5% (Pg, Ol and Cpx).	5%	-	0.1	L	"	Phenocryst 2-5mm long.
11	Pillow Basalt	11.4	A	-	40% Pg, minor Ol.	5%	-	0.1	L	"	Some large irregular vesicles, ∿2mm thick glassy rind.
12	Basalt	3.2	A	-	5% (Pg, Ol, and Cpx).	5%	-	0.1	L	"	2-3cm of glass. Biological specimens noted.
13	"	0.2	A	-	7% (Pg, and minor Ol).	7%	-	0.1	L	-	No glass. 2-4mm phenocrysts.
14	"	0.2	A	-	"	7%	-	0.1	L	Glass to palagonite.	2mm glassy margin. 2-4mm phenocrysts.
15	"	0.4	A	-	30% Pg - subhedral.	1%	—	—	M	"	2-5cm glassy rind.
16	Pillow Basalt	4.5	F	-	50% Pg minor Ol and Cpx.	1%	—	—	L	"	Two samples total (A&B). 2-4mm of glass.
17	Basalt	7.6	A	-	7% (Pg, Ol and Opx.)	7%	-	0.1	L	"	3-4mm of glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 27 DREDGE 27 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
18	Basalt	-	F	-	-	——		0.1	L	-	-
19	"	0.2	A	-	3% Pg and Ol.	4%	-	TR	L	-	Two samples total (A&B). Phenocrysts ~2-4mm long.
20	"	0.2	A	-	5% (Pg, Ol and Cpx).	5%	-	0.1	L	Glass to palagonite.	2-3mm of glass. Biological specimens noted.
21	"	0.2	A	-	3% Pg.	4%	-	TR	L	"	Two samples total (A&B). ~2mm of glass.
22	"	0.2	A	-	3% Pg - (Ol?).	4%	-	TR	L	"	~2mm of glass.
23	"	0.1	A	-	3% Pg, minor Ol ?	4%	-	TR	L	"	Three samples total (A-C). 1-2mm glass.
24	"	0.2	A	-	3% Pg (Ol?).	4%	-	TR	L	"	2-3mm of glass.
25	"	0.2	F	-	3% Ol, Pg and Cpx.	5%	-	1.0	M	-	Three samples total (A-C).
26	"	0.4	A	-	~25% Pg, minor Ol.	1%	——		L	Glass to palagonite.	2-5mm of glass.
27	"	0.1	A	-	40% Pg, Ol and Cpx.	3%	——		L	"	2-3mm of glass.
28	"	0.1	A	-	3% Pg, (1-2mm long).	4%	-	TR	L	"	Two samples total. 2-3 cm of glass.
29	"	0.4	A	-	25% Pg and Ol.	1%	-	0.1	L	"	2-4mm of glass. Large, elongated vesicle noted.
30	"	0.2	A	-	60% Pg with minor Ol & Cpx.	3%	-	TR	M	"	2-5mm of glass. Subhedral phenocrysts 2-13mm long.
31	"	0.2	A	-	3% Pg, (2-4mm long).	4%	-	TR	L	"	2-3mm of glass.
32	"	0.1	F	-	50% Ol, Cpx and Pg.	3%	-	0.1	L	-	Three samples total (A-C). No glass.
33	"	0.2	A	-	3% Pg, minor Ol?	4%	-	TR	L	Glass to palagonite.	Two samples total (A&B). 2-3mm of glass.
34	"	0.3	A	-	3% Pg, minor Ol.	3%	-	0.1	M	"	2-5cm of glass.
36	"	0.7	F	-	3% Ol and Pg.	3%	-	0.2	L	-	Two samples total (A&B).

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 27 DREDGE 27 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
37	Basalt	0.1	A	-	35% Pg and Ol.	3%	-	0.2	M	Glass to palagonite.	Two samples total (A&B). 1-3mm of glass.
38	"	2.7	A	-	∿30% Pg (2-4mm long).	4%	-	TR	M	-	Two samples total (A&B).
40	"	0.1	F	-	5% Pg, 1.5% Cpx and 0.5% Ol.	3%	-	0.2	M	-	Three samples total (A-C). No glass.
41	"	0.4	A	-	2% Pg (Ol?).	3%	-	0.1	L	Glass to palagonite.	2-3 cm of glass.
42	"	0.3	F	-	40% Pg, minor Ol and Cpx.	3%	-	-	M	"	Glassy margin noted.
43	"	0.2	A	-	5% (Pg, Cpx and Ol).	5%	-	0.1	L	"	2-3mm glassy margin.
44	"	4.5	A	-	7% Pg, minor Ol.	7%	-	0.1	L	"	2mm glassy margin.
45	"	0.4	A	-	7% Pg and Cpx. Minor Ol.	5%	-	0.2	M	"	Two samples total (A&B). 1-2mm glassy rind.
46	"	4.5	A	-	7% Pg and minor Ol.	7%	-	0.1	L	"	2-3mm of glass. Attached coral.
47	"	5.5	F	-	∿30% Pg (2-4mm long).	4%	-	TR	M	"	2-4mm of glass.
48	"	11.4	A	-	7% Pg, minor Ol.	7%	-	0.1	L	"	3-4mm of glass.
49	"	9.1	A	-	"	7%	-	0.1	L	"	2mm of glass.
50	"	0.2	A	-	5% (Pg, Cpx, and Ol).	5%	-	0.1	L	"	"
52	"	0.1	A	-	3% Pg (1-2mm long).	4%	-	TR	L	"	Noted glass.
53	"	0.2	A	-	25% Pg, minor Ol.	1%	-	-	L	"	Irregularly shaped with "glass fold" - 3mm to 2.5 cm thick.
54	Basalt	3.2	F	-	5% (Pg, Cpx and Ol)	5%	-	0.1	L	Glass to palagonite.	2-3mm of glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 30 DREDGE 30 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Porphyritic Basalt	2.0	F	-	Large (≤25mm) Pg, minor Cpx and Ol.	TR	-	TR	M	Glass to palagonite.	1mm glassy rind. Attached biological sample.
2	Porphyritic Basalt	2.3	F	-	Large Pg, Cpx and Ol.	TR	——		L	Glass to palagonite.	Attached biological sample.
3	"	1.4	F	-	"	2%	-	TR	L	-	Mn encrusted coral noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 32 DREDGE 32 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	23.0	A	-	∿1% Pg, minor Ol.	15%	-	0.5	M	Glass to palagonite.	Six samples total (A-F). 0-3mm of glass. Burrowed sediment noted.
2	Pillow Basalt	7.0	F	-	∿1% Cpx.	5%	-	0.5	M	-	No glass. Jointed, scoriaceous.
3	"	7.0	F	-	∿1% Cpx.	5%	-	0.5	M	-	No glass. 5mm chill margin, columnar jointing.
4	"	4.5	A	-	Pg, Cpx & Ol.	4%	-	0.1	M	Glass to palagonite.	2-3mm of glass. 5mm thick chill margin.
5	Basalt	11.4	F	-	-	5%	-	1.0	M	"	1-2mm glassy margin. Chill margin noted. Jointed
6	Aphyric Basalt	0.1	A	-	-	TR	-	TR	L	"	2-3mm of glass. Brecciated fragments noted.
7	Coral	-	-	-	-	—	—	—	—	-	-
8	Pillow Basalt	0.5	A	-	∿1% Pg, minor Ol.	15%	-	0.5	M	Glass to palagonite.	0-3mm of glass.
9	Basalt	0.2	F	-	∿1% Pg (2-3mm).	TR	-	0.5	L	-	No glass. Interpreted as lava ledge?
10	Pillow Basalt	3.2	F	-	-	3%	-	0.5	L	Glass to palagonite.	2-3mm of glass. 1cm wide chill margin. Jointed.
11	"	0.7	F	-	<1% Pg.	5%	-	0.5	L	"	1-2mm glass.
12	Basalt	4.5	F	-	-	5%	—	—	L	-	No glass. Scoriaceous zone noted.
13	"	0.1	A	-	-	TR	-	2.0	L	Glass to palagonite.	2-5mm of glass. Folded chill margin.
14	"	1.4	F	-	1% Pg.	TR	-	0.1	M	"	2-5mm of glass. Coral fragments noted.
15	"	4.5	F	-	-	5%	-	0.5	L	"	2-3mm of glass. Some biological specimens noted.
16	"	2.3	F	-	Pg laths visible.	5%	-	TR	L	-	No glass.
17	Aphyric Basalt	0.1	A	-	-	TR	-	TR	L	Glass to palagonite.	2-5mm glass. Breccia and scoria noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 32 DREDGE 32 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/21/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
18	Aphyric Basalt	1.4	A	-	-	5%	-	0.2	M	Glass to palagonite.	3-5mm of glass. Some scoria noted.
19	"	0.4	A	-	-	TR	-	0.1	L	"	1mm of glass. Some scoria and breccia noted.
20	Basalt	0.1	F	-	-	5%	-	1.0	M	"	2-3mm of glass.
21	Aphyric Basalt	0.4	A	-	-	4%	-	1.0	L	"	2-3mm of glass. Chill margin 5mm wide.
22	Basalt	1.4	A	-	<1% subhedral Pg.	4%	-	0.5	M	"	Two samples total (A&B). TR glass. Biological specimens noted.
23	Basalt	0.2	F	-	-	5%	-	1.0	M	Glass to palagonite.	2-3mm of glass.
24	"	3.2	F	-	-	3%	-	0.5	L	"	Two samples total (A&B). 3-5mm glassy surface.
25	Aphyric Basalt	0.1	A	-	-	TR	——		L	"	2-3mm glass. Brecciated zones noted.
26	"	0.9	F	-	-	10%	-	1.0	L	-	No glass. Jointed.
27	Basalt	0.1	F	-	-	5%	-	1.0	M	Glass to palagonite.	1mm of glass.
28	Aphyric Basalt	0.1	A	-	-	TR	——		L	"	2-10 cm of glass. Double chill margin, crenulated.
29	"	0.1	A	-	-	TR	-	TR	L	"	2-9mm of glass - fractured. Noted coral test.
30	"	0.3	F	-	-	12%	-	1.0	L	-	No glass. Talus fragment.
31	"	0.1	A	-	-	TR	-	0.1	L	Glass to palagonite.	3-7mm glass.
32	Basalt	0.1	A	-	1% subhedral Pg.	TR	-	0.5	L	"	TR glass. Chill margin and attached coral noted.
33	Aphyric Basalt	0.1	A	-	-	TR	-	0.5	L	"	2-5mm glass. Double chill margin. Lineated vesicles.
34	"	0.5	A	-	-	TR	——		L	"	2-7mm glass. Double chill margin.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 32 DREDGE 32 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/26/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
35	Aphyric Basalt	0.1	A	-	-	TR	-	TR	L	Glass to palagonite.	Brecciated and scoriaceous zone noted. TR glass.
36	Basalt	4.5	F	-	-	5%	-	1.0	M	"	1-2 mm glassy surface.
37	"	0.2	F	-	-	5%	-	1.0	M	"	Unaltered glass and palagonite noted.
38	Plag.-phyric Basalt	2.3	F	-	Rare subhedral Pg (1-3mm long).	7%	-	0.1	L	"	Six samples total (A-F). 1-4mm glass. Scoriaceous zone noted.
39	Basalt	0.1	F	-	-	5%	-	1.0	M	Glass to palagonite.	2-3mm of glass.
40	Aphyric Basalt	0.2	A	-	-	TR	-	0.1	L	"	1-3mm of glass. Double chill margin.
41	Basalt	6.8	F	-	-	5%	-	1.0	M	"	1-3mm of glass.
42	"	4.5	F	-	<1% Cpx.	5%	-	0.2	L	-	No glass. Small scoriaceous zone noted.
43	Aphyric Basalt	0.5	A	-	-	5%	-	0.2	M	Glass to palagonite.	2-4mm of glass - ropey and fractured texture.
44	Basalt	0.5	F	-	-	5%	-	1.0	M	"	~2mm of glass.
45	"	0.9	F	-	-	5%	-	1.0	M	"	2-3mm of glass. (attached)
46	"	0.7	F	-	-	5%	-	1.0	M	-	1mm fresh glass.
47	Aphyric Basalt	0.7	F	-	<1mm long Pg and Cpx noted.	30%	-	TR	M	Glass to palagonite.	1-2mm of glass. Jointed. chill margin noted.
48	"	0.1	A	-	-	25%	-	TR	M	"	TR glass. 25% of rock is scoria and brecciated.
49	Basalt	1.4	F	-	-	5%	-	1.0	M	"	Glass on surface.
50	"	0.5	F	-	-	5%	-	1.0	M	"	2-4mm of glass.
51	Aphyric Basalt	0.1	F	-	-	3%	-	0.5	L	-	No glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 32 DREDGE 32 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/26/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
52	Basalt	0.1	F	-	∿1% subhedral Pg (2-3mm long).	TR	-	0.5	L	-	Five samples total (A-F). No glass.
53	"	6.8	F	-	-	5%	-	1.0	M	Glass to palagonite.	2-3mm of glass. Coral fragment noted.
54	Aphyric Basalt	1.8	A	-	-	5%	-	0.2	L	-	No glass.
55	"	0.1	A	-	-	TR	-	0.1	L	Glass to palagonite.	2-10mm glassy rind. One large vesicle noted.
56	"	0.2	F	-	-	30%	-	0.5	L	-	Two samples total (A&B). No glass. Scoriaceous
											zone noted.
57	Basalt	6.8	F	-	-	5%	-	1.0	M	Glass to palagonite.	2-3mm of glass.
58	Aphyric Basalt	0.1	A	-	-	TR	—	—	L	"	1-2mm of glass. Brecciated and scoriaceous zones
											noted.
59	Basalt	0.4	F	-	-	5%	-	1.0	M	Glass to palagonite.	1-3 cm of glass. Large (3-5mm) vesicles noted.
60	Aphyric Basalt	0.1	A	-	-	TR	-	0.1	L	"	1-15mm of glass. Glass shows polygonal fractures.
61	"	11.4	F	-	-	30%	-	TR	M	"	0-2mm of glass. One large vesicle noted. Radial
											joints.
62	Aphyric Basalt	20.4	F	-	-	3%	-	0.1	L	Glass to palagonite.	1-3mm of glass. 1.5 cm chill margin. Columnar
											joints.
63	Aphyric Basalt	0.1	A	-	-	TR	-	TR	L	-	Scoria and breccia noted.
64	"	0.1	F	-	-	2%	TR	0.5	M	-	No glass. Groundmass composed of <1mm Pg and Cpx.
65	Basalt	18.0	F	-	<1% Pg and Cpx.	5%	-	1.0	M	Glass to palagonite.	2-3mm of glass. Jointed. Pillow fragment?

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 32 DREDGE 32 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/26/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
66	Basalt	9.1	F	-	-	1%	-	0.5	L	Glass to palagonite.	2-3mm of glass. Jointed. 0.5 cm chill margin.
											Scoriaceous zone noted.
67	Aphyric Basalt	0.1	F	-	-	2%	TR	0.5	M	-	-
68	Basalt	9.1	F	-	-	TR	-	0.1	L	Glass to palagonite.	Two samples total (A&B). 2-4mm of glass. 0.5 cm
											chill margin. Scoriaceous zone noted.
69	Aphyric Basalt	0.1	A	-	-	5%	——		L	-	Small brecciated zones.
70	"	4.5	F	-	-	5%	-	0.1	M	Glass to palagonite.	1-2mm of glass. Radial columnar joints. Coral and
											sponge attached.
71	Aphyric Basalt	6.8	F	-	-	5%	-	0.1	L	Glass to palagonite.	2-3mm of glass. 0.5 cm chill margin, jointed.
72	Basalt	9.1	F	-	Rare subhedral Cpx grains.	5%	-	0.2	M	"	2-3mm of glass. Scoriaceous zone noted.
73	Aphyric Basalt	4.5	F	-	-	5%	-	TR	M	"	2-3mm of glass. 0.5 cm chill margin, jointed.
74	"	0.5	F	-	-	3%	-	TR	L	"	2-3mm of glass - patchy. 4mm chill margin. Fractured.
75	"	0.2	F	-	-	4%	-	0.5	M	"	2-4mm of glass. 5mm chill margin, jointed.
76	"	6.8	F	-	-	3%	-	0.5	M	"	2-3mm glass. 1cm chill margin. Radial joints.
77	"	6.8	F	-	-	3%	-	0.5	M	"	2-3mm glass. 5 cm chill margin, jointed.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 33 DREDGE 33 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/26/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2	Aphyric Basalt	5.5	F	-	-	20%	-	0.2	L	-	No glass. Some biological specimens noted (coral).
3	Aphyric Pillow Basalt	4.5	A	-	-	——		TR	L	Glass to palagonite.	4mm glassy rind. Radial cooling fractures.
4	Pillow Basalt	4.5	F	-	Pg + Cpx + Ol.	1%	-	TR	M	"	4mm glass margin. Phenocrysts: 1-10mm long.
5	Basalt	0.9	F	-	(<5mm) Pg, Ol (<2mm)	3%	-	TR	M	"	2mm of glass.
6	Pillow Basalt	6.8	F	-	Pg (<6mm). Minor Ol (<3mm)	20%	-	TR	M	"	2mm of palagonite.
7	Sparsely Phyric Basalt	2.0	F	-	Sparse, (3-5mm) Pg and Ol.	7%	-	0.1	L	"	2mm of altered glass. Cooling level is vesicular.
8	Porphyritic Pillow Basalt	1.8	F	-	Pg (<1cm).	——			L	"	~2mm glass.
9	Basalt	0.9	F	-	(<7mm) Pg and Ol (<4mm).	3%	-	TR	M	"	1mm of glass.
10	"	0.4	F	-	15% Pg (1-7mm).	1%	-	TR	M	"	1mm of glass.
11	Sparsely Phyric Basalt	3.6	F	-	Ol, <Cpx, <Pg.	8%	——		L	"	2mm fairly fresh glass. Phenocrysts: 2-5mm.
12	Basalt	1.4	F	-	Pg + Ol + Cpx.	2%	-	TR	M	"	2mm of glass. Phenocrysts: 2-8 mm.
13	"	0.9	F	-	Pg (<3mm).	4%	-	TR	M	-	-
14	"	1.8	F	-	(<7mm) Pg & Ol.	2%	-	TR	M	Glass to palagonite.	2mm of glass.
15	Sparsely Phyric Basalt	0.9	F	-	(15mm) Pg and (5mm) Ol.	2%	-	TR	M	"	4mm altered glass.
(16 - 35)	SEE END OF DREDGE	DESCRIPTION:		(STATION	33 - DREDGE 33).						
36	Basalt	0.2	F	-	Pg & Ol (4mm).	1%	——		M	Glass to palagonite.	1mm of glass.
37	SEE END OF DREDGE	DESCRIPTION:		(STATION	33 - DREDGE 33).						
38	Pillow Basalt	3.2	F	-	Pg + Ol + Cpx, (4-5mm).	1%	-	TR	M	Glass to palagonite.	2mm of glass (altered).

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 33 DREDGE 33 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/26/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
39	Pillow Basalt	27.0	A	-	7% Pg, 6% Cpx and 2% Ol.	6%	-	0.1	M	Glass to palagonite.	2-3mm glassy surface. TR of coral fragment.
40	"	22.0	A	-	35% Pg, ~10% Ol and Cpx.	5%	-	0.1	L	"	2-4cm glassy surface.
41	"	27.0	F	Small Pg laths.	10% (Pg > Cpx > Ol).	10%	TR	0.1	L	-	2-3cm fresh glass. TR of coral, radial joints.
42	"	22.8	A	-	5% (Pg > Cpx > Ol).	5%	—	—	L	Glass to palagonite.	1mm of glass; spalled off. Patches of calcareous
											cement noted.
43	Basalt	4.5	A	-	5% Pg and Cpx.	30%	-	0.1	L	-	Lineated vesicles.
44	MISSING										
45	Basalt	1.4	F	-	Pg & Ol (3mm).	3%	-	TR	M	Glass to palagonite.	2mm of glass.
46	"	1.8	F	-	(<7mm) Pg and (<5mm) Ol.	1%	—	—	M	"	4mm of glass.
47	Pillow Basalt	2.3	F	-	(5mm) Pg, (3mm) Cpx and minor	2%	-	TR	M	"	3mm partially altered glass
					Ol - total 2%.						
48	SEE END OF DREDGE DESCRIPTION: (STATION 33 - DREDGE 33).										
49	Basalt	0.9	F	-	(<4mm) Pg and Ol (1mm).	5%	-	0.1	M	-	-
50	"	0.2	F	-	3mm - (Pg + Ol + Px).	3%	—	—	M	Glass to palagonite.	1mm of glass. Talus fragment?
(51, 52)	SEE END OF DREDGE DESCRIPTION: (STATION 33 - DREDGE 33).										
53	Basalt	0.9	F	-	Pg + Ol (5mm).	2%	—	—	M	Glass to palagonite.	4mm of glass.
54	Pillow Basalt	3.2	F	-	Pg ≥ Cpx ≥ Ol (3-5mm long).	3%	—	—	M	"	4mm of glass.
55	SEE END OF DREDGE DESCRIPTION: (STATION 33 - DREDGE 33).										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 33 DREDGE 33 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
56	Basalt	0.2	F	-	Pg & Ol (2mm).	1%	-	TR	M	Glass to palagonite.	1mm of glass.
57	Pillow Basalt	0.9	F	-	(3-6mm) Pg + Cpx + Ol.	2%	——		L	"	3mm fairly fresh glass.
(58 - 60)	SEE END OF DREDGE DESCRIPTION: (STATION 33 - DREDGE 33).										
61	Basalt	0.5	F	-	Pg + Ol (4mm).	1%	——		M	Glass to palagonite.	1mm of glass.
62	Pillow Basalt	2.7	F	-	Pg + Cpx + Ol (1-3mm).	1%	-	TR	M	"	2mm of glass (altered).
63	Sparsely Phyric Pillow Basalt	3.2	F	-	Pg + Cpx + Ol (2-6mm).	1%	——		M	-	2mm fairly fresh glass. Mn coating is patchy.
64	Basalt	0.9	F	-	Pg + Ol (3mm).	1%	-	TR	M	Glass to palagonite.	1mm of glass. Talus fragment?
65	Pillow Basalt	1.3	F	-	Pg + Ol (2-4mm).	5%	-	0.5	M	"	3mm of glass (altered). Weathering is patchy.
66	Sparsely Phyric Pillow Basalt	4.5	F	-	1% Pg + Cpx + Ol (3-15mm).	1%	-	TR	M	"	3mm of glass (altered).
67	"	1.8	F	-	Pg + Cpx + Ol (3-10mm).	2%	——		M	"	2-3mm of glass (altered).
68	Plag. Phyric Pillow Basalt	2.7	F	Pg.	20% Pg + rare Cpx.	1%	——		M	"	2mm of glass (patchy).
NOTE:	THE SAMPLE SETS BELOW ARE ALL SMALL TALUS (?) FRAGMENTS RANGING BETWEEN 0.1 to 0.4 kg in weight.										
SAMPLES:	#16-#20, #22, #24-#28, #30-#34, #37, #51-52, #55, and #58-60.										
	Angular Basalt (Talus)	7.0	F	-	Pg + Ol (1-5mm).	1-5%	-	TR	M	Glass to palagonite.	Noted altered glass.
SAMPLES:	#21, #23, #29, #35, and #48.										
	Angular Basalt (Talus)	1.0	F	-	Pg + Ol (1-7mm).	1-3%	-	TR	M	Glass to palagonite.	Thin glass and its alteration product palagonite.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 35 DREDGE 35 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	3.2	F	-	5%-Pg + Cpx + Ol (3-7mm).	1%	-	TR	M	Glass to palagonite.	3mm altered glass. Mn coating is patchy.
2	"	4.5	F	-	3%-Pg + Ol + Cpx (2-5mm).	1%	-	TR	M	"	3mm partially altered glass. Mn coating is patchy.
3	Pillow Basalt	1.8	F	-	15%-Pg + Ol, minor Cpx (1-10mm).	1%	——		L	-	4mm fairly fresh glass.
4	Basalt	2.0	F	-	Pg + Ol (3-7mm).	5%	-	TR	M	Glass to palagonite.	Palagonitized rim. Talus fragment(?) Extensive Mn crust.
5	Pillow Basalt	3.2	F	-	3%-Pg + Ol + Cpx (2-15mm).	3%	-	0.1	M	Glass to palagonite.	Little glass. Some palagonite.
6	Basalt	2.7	F	-	1%-Pg + Ol (5mm).	2%	-	0.1	M	"	Palagonitized rim, patchy Mn coating.
7	Pillow Basalt Fragment	0.1	-	-	Pg + Ol (1-7mm).	1%	——		M	"	Noted: Altered glass. (Talus?).
8	Basalt	1.6	F	-	Pg + Cpx + Ol.	3%	——		M	"	Palagonitized rim. (Talus?)
9	"	0.9	F	-	Pg + Ol (2-7mm).	1%	-	TR	M	"	2mm glass (some alteration) Mn coating patchy. (Talus?)
10	Pillow Basalt	1.6	F	-	5% - Pg + Ol (3-13mm).	1%	——		L	-	2mm partially altered glass Radial cooling joints.
11	"	1.8	F	-	3% - Pg + Cpx, minor Ol (2-7mm).	1%	-	TR	M	Glass to palagonite.	3mm partially altered glass Patchy Mn and weathering.
12	Basalt	1.3	F	-	10% - Pg + Cpx, minor Ol (3-10mm).	TR	——		L	"	2mm fairly fresh glass.
(13 - 19)	Pillow Basalt Fragments	2.0	-	-	Pg + Ol (1-7mm).	1%	——		M	"	Noted: Altered glass. (Talus?).
20	"	6.8	F	-	3% - Pg + Cpx minor Ol (2-14mm).	1%	——		L	"	3mm partially altered glass. TR of sediment.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 35 DREDGE 35 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
21	Pillow Basalt	29.0	F	-	Pg + Cpx + Ol (4-13mm).	1%	-	TR	M	Glass to palagonite.	Two samples total (A&B). 2-4mm partially altered glass.
22	"	25.0	F	-	2% Pg + Cpx + Ol (4-10mm).	TR	—	—	M	Glass to palagonite.	3mm highly altered glass. Radial cooling joints.

		STATION:	37	DREDGE: 37						DATE: 12/27/84
1	Pillow Basalt	22.8	F	Fine grained Pg laths.	15% subhedral Pg, minor Ol.	8%	-	0.5	M	Glass to palagonite.	2-3mm of glass. "Micro-scoriaceous" core. Jointed.
(2-9)	Pillow Basalt Fragments	1.8 tot.	F	-	5% Pg, minor Ol.	10%	-	TR	L	Glass to palagonite.	8 samples total. Most samples exhibit glassy margins.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 38 DREDGE 38 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	3.6	F	-	Pg + Ol 4-8mm).	1%	-	TR	L	Glass to palagonite.	4mm of glass (altered).
2	Basalt	1.4	F	-	7% Pg + Ol (2-10mm).	1%	-	0.1	L	"	0-2mm of glass noted.
3	"	0.5	F	-	10% Pg (10mm).	TR	—	—	L	-	2mm of glass.
4	"	0.5	F	-	2% Pg noted.	1%	-	TR	L	Glass to palagonite.	Two samples total (A&B). 3mm of glass.
5	"	1.4	F	-	7% Pg (6mm) + minor Ol.	1%	-	0.1	M	"	"
6	Pillow Basalt	0.5	F	-	5% Pg (5mm) + minor Ol.	TR	—	—	L	"	2-3mm partially altered glass.
7	Basalt	0.9	F	-	20% large, zoned Pg.	1%	-	0.2	L	-	No glass.
					Minor Ol.						
8	Basalt	22.8	F	-	18% Pg, 2% Ol. Coarse grained.	8%	—	—	L	Glass to palagonite.	0-3mm partially altered glass. Poorly defined
											joints.
9	Basalt Glass	0.2	A	-	12% large Pg.	TR	—	—	L	-	Two samples total (A&B). All glass, fairly fresh
											sediment coating.
10	Basalt	0.9	A	-	Large Pg.	—	—	—	L	Glass to palagonite.	2-4 cm glassy rind. Fairly fresh.
11	Pillow Basalt Rind	0.1	F	-	Abundant Pg.	TR	-	TR	M	"	Two samples total (A&B). Palagonitized margin.
12	Basalt	0.1	F	-	50% Pg.	—	—	—	L	"	Remnant glass. No sample remaining.
13	NO SAMPLE		REMAINING								

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 41 DREDGE 41 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Phyric Basalt	6.4	A	-	20% Pg, 3% Ol, and 2% Cpx.	15%	-	1.0	M	Glass to palagonite.	1 cm glassy surface. Pahoehoe texture.
2	"	0.5	F	-	10% Pg, 8% Cpx and 2% Ol.	15%	—	—	L	-	2-5mm glassy surface. Pahoehoe texture.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 43 DREDGE 43 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	2.3	F	-	Sparse Pg (≤3mm).	1%	-	TR	M	Glass to palagonite.	2mm partially altered glass. (Talus?). Attached biological specimen.
2	Basalt	2.3	F	-	Ol>Pg (≤3mm).	2%	-	TR	L	-	Fairly altered. (Talus?). Patchy Mn coating.
3	"	0.4	F	-	Ol>Pg (<1mm).	1%	-	0.5	M	-	(Talus?)
4	Pillow Basalt	0.7	F	-	Sparse Ol & Pg (2-3mm).	1%	—	—	M	Glass to palagonite.	3mm partially altered glass.
5	"	0.9	F	-	TR-Pg + Ol (2-3mm).	1%	-	TR	M	"	2mm highly altered glass.
6	Basalt	0.7	F	-	"	TR	-	TR	M	"	3mm slightly altered glass. (Talus).
7	"	0.9	F	-	Sparse Pg & Ol (3mm).	1%	-	TR	M	-	2mm of glass. Cooling joints noted. (Talus?).

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 46 DREDGE 46 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/27/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	0.2	F	-	3% Pg (<2mm).	1%	-	TR	L	Glass to palagonite.	4mm of glass.
2	"	0.4	F	-	Pg (≤5mm).	1%	-	TR	L	-	No glass.
3	"	0.9	F	-	3% Pg (1-2mm) w/minor Ol.	3%	-	TR	L	Glass to palagonite.	Two samples total (A&B). 2-3mm partially altered glass. Chill margin (1cm) noted.
4	Basalt	1.8	F	-	3% Pg (<1mm).	1%	-	TR	L	Glass to palagonite.	3mm of glass.
5	"	0.9	F	-	"	5%	-	TR	L	"	"
6	"	2.3	F	-	Pg (≤5mm).	1%	-	TR	L	"	3mm of glass.
7	"	3.6	F	-	2% Pg (<2mm).	1%	-	TR	L	"	"
8	"	9.1	F	-	Pg (<4mm).	TR	-	TR	L	"	"

WHOI ROCK SAMPLE DESCRIPTION

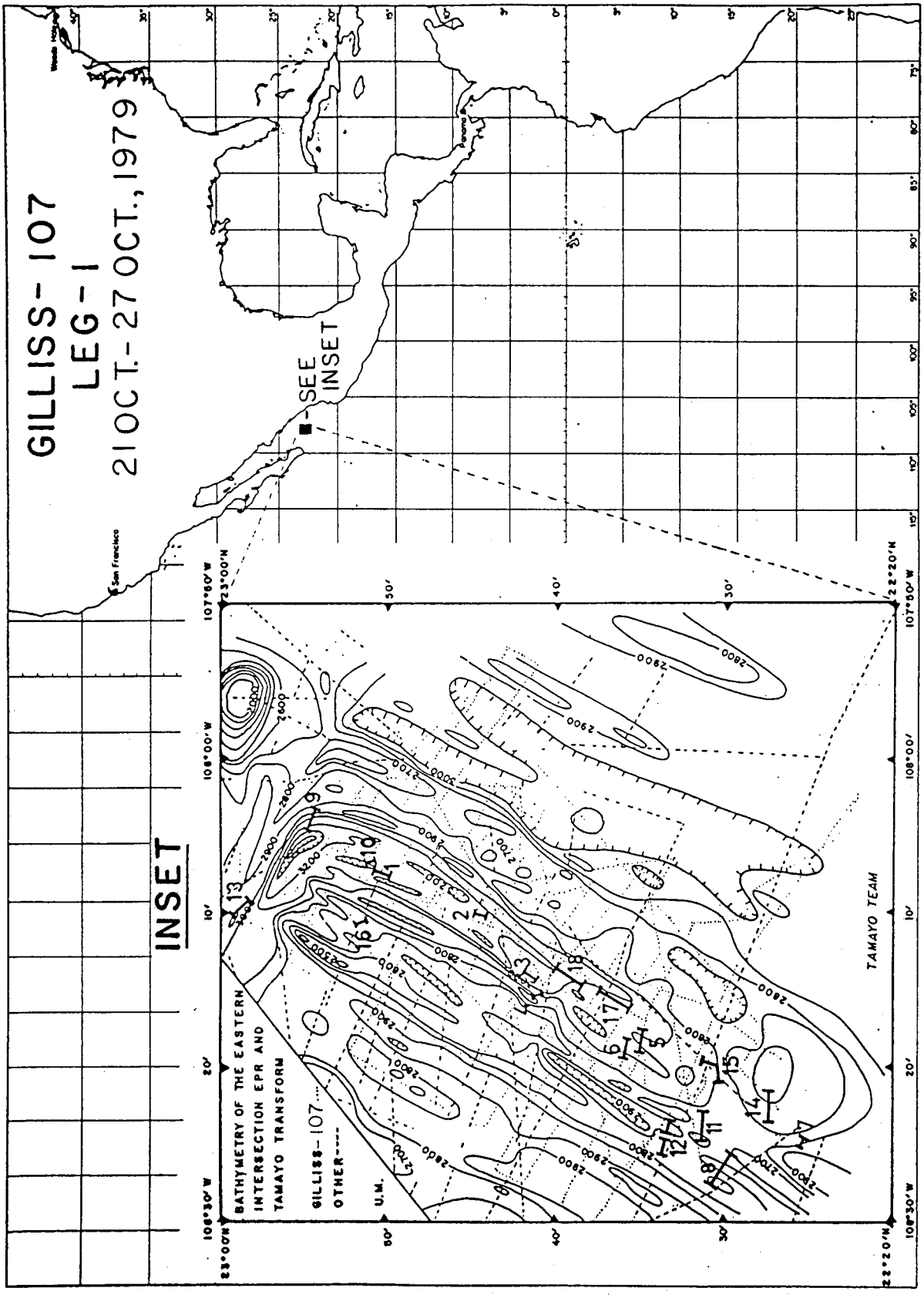
CRUISE GIL 103 STATION 47 DREDGE 47 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/28/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Aphanitic Basalt	4.5	A	-	45% Pg (2-5mm), 5% Ol (2mm).	3%	-	1.0	L	Glass to palagonite.	TR of glass (altered). Chill margin and radial fractures noted.
2	(Pillow?) Basalt	4.5	A	-	45% Pg, Ol 10%, Cpx 5%.	3%	-	4.0	L	"	TR altered glass. Columnar joints and chill margin noted.
3	Basalt	0.5	F	-	-	TR	-	0.1	L	-	Sediment coating. Brecciated zone noted.
4	Pillow Basalt	9.1	F	-	72% Pg, 4% Ol and 4% Cpx.	5%	-	2.0	M	Glass to palagonite.	1-2mm of glass (patchy). 1 cm chill margin, radial joints.
5	Pillow Basalt	3.6	F	-	47% Pg, 3% Ol.	3%	-	2.0	M	Glass to palagonite.	0-1mm altered glass. Scoria and chill margin noted.
6	Basalt	13.6	F	-	43% Pg, 5% Ol and 2% Cpx.	2%	-	3.0	L	Glass to palagonite.	TR glass. Chill margin, joints and scoriaceous zone noted.
7	Pillow Basalt	9.1	F	-	45% Pg, 3% Ol and 2% Cpx.	3%	-	2.0	M	Glass to palagonite.	Three samples total (A-C). Partially weathered glass noted.
8	Basalt	13.5	A	-	60% Pg, 7% Ol and 3% Cpx.	3%	-	0.1	M	Glass to palagonite.	TR glass (altered). 1cm chill margin, weathered joints.
9	Basalt	11.4	F	-	47% Pg and 3% Cpx.	3%	-	2.0	L	-	TR fresh glass. 1cm chill margin, radial joints.
10	"	0.7	F	-	TR-Pg and Px.	7%	-	0.1	L	-	No glass.
11	"	3.2	A	-	27% Pg, 2% Ol and 1% Cpx.	TR	-	2.0	M	-	Two samples total (A&B). TR fresh glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 103 STATION 47 DREDGE 47 DESCRIBED BY A.M.A.R. Team/Paul Andrew DATE 12/28/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
12	Basalt	1.4	A	-	-	3%	——		L	-	No glass.
13	"	2.5	A	-	54% Pg, 4% Ol, and 2% Cpx.	3%	-	0.5	L	-	Two samples total (A&B). No glass.
14	"	0.9	A	-	36% Pg, 2% Ol, and 2% Cpx.	3%	-	0.1	M	Glass to palagonite.	TR glass. 1cm chill margin, radial joints.
15	"	0.1	F	-	"	3%	-	2.0	M	"	No fresh glass remaining.
16	"	1.4	A	-	47% Pg and 3% Cpx.	3%	-	2.0	M	"	Two samples total (A&B). TR glass. 1cm chill margin.
17	Basalt	0.1	A	-	-	TR	-	0.1	L	-	No glass.
18	"	3.6	F	-	72% Pg, 13% Ol and 4% Cpx.	1%	-	0.5	M	-	No glass.
19	"	9.1	F	-	67% Pg, 4% Ol, and 4% Cpx.	3%	-	0.5	M	-	No glass.
20	"	5.0	A	-	45% Pg, 3% Ol, and 2% Cpx.	3%	-	0.2	M	Glass to palagonite.	TR fresh glass. 1 cm chill margin, radial joints.
21	Basalt	22.8	F	-	Pg + Ol + Cpx (3-15mm).	——		2.0	M	-	No glass, extensive Mn-coating. (Talus?).
22	Pillow Basalt	15.5	F	-	"	——		TR	M	Glass to palagonite.	2mm of glass. — (Altered). radial cooling joints.
23	Basalt	45.0	F	-	Pg + Ol + Cpx (3-10mm).	5%	-	1.0	L	-	No glass. Poorly developed jointing.
24	"	5.5	F	Green ground-mass.	Pg + Ol + rare Cpx (1-3mm).	——		TR	L	-	No glass. Highly altered talus fragment?
25		45.0	F	-	15% Pg + Ol + Cpx.	——		1.0	L	Glass to palagonite.	Attached talus fragment?
26	"	25.0	F	-	Pg + Ol + Cpx (20-60mm).	TR	-	1.0	M	-	No glass, (Talus?). Poorly developed jointing.


GILLISS- 107
LEG- I
21 OCT.- 27 OCT., 1979
■- SEE INSET
INSET
BATHYMETRY OF THE EASTERN INTERSECTION EPR AND TAMAYO TRANSFORM
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TAMAYO TEAM
San Francisco
Panama

********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
GIL	107	1	0001	0000	8	791021	22 50.1'N	108 8.4'W	9	83.28	0001	3215.	3125.	041K	14	0000	0	
GIL	107	1	0002	0000	8	791022	22 45.2'N	108 10.0'W	9	83.28	0002	3050.	3050.	034K	16	0000	0	
GIL	107	1	0003	0000	8	791022	22 41.8'N	108 13.6'W	9	83.28	0003	3000.	3035.	010K	16	0000	0	
GIL	107	1	0004	0000	8	791022	22 40.4'N	108 14.3'W	9	83.28	0004	2975.	3035.	2.3K	16	0000	0	
GIL	107	1	0005	0000	8	791023	22 34.6'N	108 24.0'W	9	83.28	0005	2900.	2865.	4.5K	16	0000	0	
GIL	107	1	0006	0000	8	791023	22 35.5'N	108 19.7'W	9	83.28	0006	2975.	2875.	091K	16	0000	0	
GIL	107	1	0007	0000	8	791024	22 25.9'N	108 24.6'W	9	83.28	0007	2630.	2530.	073K	16	0000	0	
GIL	107	1	0008	0000	8	791024	22 29.4'N	108 25.2'W	9	83.28	0008	2650.	2720.	045K	16	0000	0	
GIL	107	1	0009	0000	8	791024	22 54.1'N	108 24.3'W	9	83.28	0009	3195.	3195.	3.6K	16	0000	0	
GIL	107	1	0010	0000	8	791024	22 50.7'N	108 7.1'W	9	83.28	0010	3200.	3100.	4.5K	16	0000	0	
GIL	107	1	0011	0000	8	791025	22 31.0'N	108 22.9'W	9	83.28	0011	2900.	2835.	182K	16	0000	0	
GIL	107	1	0012	0000	8	791024	22 33.5'N	108 24.2'W	9	83.28	0012	2880.	2780.	011K	16	0000	0	
GIL	107	1	0013	0000	8	791025	22 58.5'N	108 9.5'W	9	83.28	0013	2780.	2850.	2.7K	16	0000	0	
GIL	107	1	0014	0000	8	791026	22 27.0'N	108 23.4'W	9	83.28	0014	2630.	2630.	3.2K	16	0000	0	
GIL	107	1	0015	0000	8	791026	22 31.1'N	108 19.5'W	9	83.28	0015	2770.	2750.	059K	16	0000	0	
GIL	107	1	0016	0000	8	791026	22 51.9'N	108 10.4'W	9	83.28	0016	2720.	2895.	027K	16	0000	0	
GIL	107	1	0017	0000	8	791027	22 37.2'N	108 14.6'W	9	83.28	0017	3000.	2950.	030K	16	0000	0	
GIL	107	1	0018	0000	8	791027	22 39.3'N	108 14.5'W	9	83.28	0018	2995.	2978.	048K	16	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 1 DREDGE 1 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 12/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9	Pg Phyric Pillow Basalt	0.3	A	-	2-3% Pg.	—	—	—	F	-	Glass (fresh) throughout sample.
1, 3, 4, 6, 10.	"	11.5	A	-	"	TR	—	—	F	-	All samples exhibit a 3mm glassy rind with some showing a vesicular core. Whole pillow.
7, 13, 15, 16, 22, 34, and 37.	Pg Phyric Pillow Basalt (fragments)	2.3	A	-	2-3% Pg.	TR	—	—	F	-	All samples exhibit an ∿2mm glassy rind. A few vesicles are present. More angular fragments than previous samples.
2, 5, 14 and 17.	Pg Phyric Basalt (Sheet Flows)	4.1	A	-	2-3% Pg.	TR	—	—	F	-	Sheet flow structure noted. Some have glass on both sides.
8, 35.	Pg Phyric Basalt	1.0	A	-	2-3% Pg.	—	—	—	F	TR palagonite.	Mostly glass. Coalesced pillows (?).
20, 23, 32, 33.	"	0.7	A	-	2-3% Pg.	—	—	—	L	Glass to palagonite.	Mostly glass but with noticeable palagonite present.
Unlabeled.	Glass Fragments	10.5	G	-	2-3% Pg.	—	—	—	F	-	Glass chips.
NOTE:	MISSING SAMPLES:	11,	12,	18, 19, 21, 24-31 and 36.							

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 2 DREDGE 2 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1C, 2, 4, 5.	Pg Phyric Basalt	7.0	A	-	3-5% Pg.	TR	-	TR	L	-	Thin (1-2mm) glassy rind on all samples with patchy Mn-oxides present. Pillow basalt character.
1A, 1E, 10, 12, 16.	Pg Phyric Pillow Basalt	19.0	A	-	3-5% Pg.	TR	-	1.0	-	-	Angular fragments exhibiting a 1mm coating of Mn. over ~2mm of fairly fresh glass.
3, 6.	Pg Phyric Basalt	1.8	A	-	3-5% Pg.	——		TR	L	-	Angular talus fragments. No glass. Mn-stain.
1D	Basalt	0.2	A	-	TR - Pg.	——		TR	L	-	White coating noted on the 2mm glassy rinds.
-1 Bag - Unlabeled.	Talus Fragment	0.7	A		Basalt with TR-Pg.	——		TR	L	-	-
NOTE:	MISSING SAMPLES: 1B, 7-11, 13, 14 and 15.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 3 DREDGE 3 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
4.	Pg-Phyric Pillow Basalt	0.3	A	-	7-10% Pg.				F	-	2mm glassy rind. Sample exhibits layered structure.
1, 14, 24.	Basaltic Glass	0.4	G	-	~3% Pg.				L	-	Ropey surface texture. Glass sheets.
8, 10.	Pg-Phyric Basalt	0.3	A	-	7-10% Pg.				L	Glass to palagonite (?)	Ropey surface texture with fresh glassy core.
7, 20, 22.	"	0.5	A	-	10% large Pg (<2mm).				F	-	Some samples exhibit glass.
-1 bag - unlabeled.	Pg Phyric Basalt Glass Fragments	5.0	G	-	7-10% Pg.					-	Glass fragments.
NOTE:	SAMPLES MISSING:	2,	3, 5,	6, 9, 11-13,	15-19, 21, 23 (?)						

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 4 DREDGE 4 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 14)	Pg-Phyric Basalt	1.2	A	-	~10% Pg.	—		TR	L	Glass to palagonite.	Thin glassy rinds. Sample #1 consists of 1 bag of angular fragments of the same composition and morphology.
15	Mn-coated Sponge	-	-	-	-	—	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 5 DREDGE 5 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1.	Aphyric Basalt	0.1	A	-	TR - Pg.	—	—	—	L	-	Trace glass noted.
5, 6, 7, 12.	Basalt Glass Rinds	0.1	G	-	TR - Pg.	—	—	TR	M	Glass to palagonite.	Thin glassy rinds.
2, 3, 8, 9, 11, 13.	Basalt Glass Sheets	0.3	G	-	-	—	—	—	F	-	Ropey surface texture.
- 1 bag - unlabeled.	Basalt Glass Fragments	3.0	G	-	TR - Pg.	—	—	—	L	-	Glassy fragments of pebble size.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 6 DREDGE 6 DESCRIBED BY Doug Bergersen/Paul Andrew DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2, 7, 55, 70.	Pg-Phyric Basalt (pillow)	20.0	A	-	1-3% Pg.	TR	—	—	L	-	Pillow basalt with iron oxide staining notable.
											Glassy rind of 2-6mm.
3, 5.	Pg-Phyric Basalt (pillow)	13.2	A	-	∿1-3% Pg.	TR	—	—	M	-	Pillow basalt with glassy layer 2-4mm thick.
											Weathering rind notable.
4, 6, 9, 21, 40, 60,	Pg-Phyric Basalt (pillow)	16.0	A	-	7-10% Pg.	TR	—	—	H	-	Pillow basalts heavily (iron-oxide?) weathered
and 63.											exhibiting vesicular cores. Glassy layer ∿5mm thick
8, 24, 31, 41, 50, 71,	Aphyric Basalt (drained pillows)	3.6	A	-	TR - Pg.	—	—	—	F	-	Basalts exhibiting glassy surface (2-5mm) on one
77, 81, 93 99, 119.											side and white clay covered flow "pillars"
											on the other.
22, 25, 29, 35, 36, 44,	Aphyric Basalt (drained pillows)	6.3	A	-	TR - Pg.	—	—	—	F	-	Drained pillow basalts showing flow "pillars"
58, 62, 64, 65, 68, 73,											covered with brownish clay on one side and a
89, 101, 106, 108, 113,											3-7mm glassy surface on the other.
116.											
17, 23, 39, 66, 103, 122.	Pg-Phyric Basalt (sheeted)	6.3	-	-	7-10% Pg.	—	—	—	L	Glass to palagonite.	Sheeted basalts exhibiting minor alteration of glass
											to palagonite
14A, 16, 18, 19, 28, 84.	Pg-Phyric Basalt	10.4	A	-	7-10% Pg.	TR	-	TR	M	Glass to palagonite.	Sheeted basalts showing notable alteration of glass
											to palagonite. Glass surfaces on both sides about
											3mm thick.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 6 DREDGE 6 DESCRIBED BY Doug Bergersen/Paul Andrew DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15, 120, 121.	Pg-Phyric Basalt (Lava Tubes)	5.5	A	-	3-5% Pg.	TR	-	TR	L	-	Basaltic lava tubes. Glass rims with vesicular cores noted.
11, 27, 37, 49, 83.	Pg-Phyric Basalt (Lava Tubes)	2.3	A	-	7-10% Pg.	TR	—	—	L	-	Basaltic lava tubes. Glass rims with vesicular cores noted.
10, 13B, 42, 54, 57, 59 and 80.	Pg-Phyric Basalt	2.7	A	-	1-3% Pg.	—	—	—	L	-	Fractured basaltic "lava tubes".
20, 26, 56, 76, 78, 90, 96, 105.	Pg-Phyric Basalt (layered)	4.8	A	-	~1% Pg.	—	—	TR	L	-	Basalt layers separated by glass notable.
32, 97, 100.	Aphyric Basalt (Talus Fragments)	1.0	A	-	TR - Pg.	TR	—	—	L	-	Angular basalt fragments
1 large bag-unlabeled.	Glassy Basalt Fragments	25.0	G-A	-	-	—	—	—	—	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 7 DREDGE 7 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/19/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
7, 8B, 8C, 10, 13, 16,	Aphyric-glassy Basalt	4.2	A	-					F	-	Fresh glass (2mm) with iron stain noted on other sur-
26, 30, 39, 42, 43, 54,											faces. Pillow-lava tubes?
and 63.											
6, 8A, 36, 36, 37, 41,	Aphyric-glassy Basalt	2.3	A	-	-				L	-	Fairly fresh glass. Some light alteration noted.
47, 98.											2mm glass on both sides, pillow-lava tubes?
11, 14, 25, and 49.	Aphyric-glassy Basalt	4.1	A	-	-				L	-	Only one fairly fresh glassy surface noted.
20, 21, 32, 33, 35, 38,	Plag.-phyric glassy Basalt	8.0	A	-	7-10% Pg.				F-L	-	Fairly fresh glass (2-4mm) noted on all sides. Pillow-
46, 52, 57, 61, (106-108).											tubes? Some iron staining.
(100 - 105).	Plag.phyric glassy Basalt	-	A	-	1-2% Pg.				F	-	Fresh pillow-lava tubes. 2mm of glass.
34A, 34B, 44, 53.	Plag.-Phyric Basalt	14.6	A	-	10% Pg. Banded character.				L	-	5mm of glass noted. Sheet flow structures - (pahoehoe).
											Iron stained.
23 and 55.	Plag.-Phyric Basalt	7.5	A	-	15-25% Pg. Banded				L	-	Extremely laminated pahoe-
					character.						hoe. 5mm of glass.
9 and 51.	Aphyric Basalt	2.5	A	-	-				L	-	Massive nature.
12,27,109.	Aphyric Basalt	0.5	G	-	-				M	-	Pahoehoe texture, composed mostly of iron stained
											glass.
Unlabeled.	Basalt Fragments	14.5	G-A	-	TR - 10%.				F-L	-	Pebble-sized sub-sample of dredge as described above.
NOTE:	Unlabeled samples were relabeled, consecutively, from #100 - #109.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 8 DREDGE 8 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1A, 1B, 2A, 2B, 2C, 4, 9 and 15.	Pillow Basalt	26.3	A	-	TR - 2% Pg.	——		<1	L	-	Mn-coated glass. Pillow structures noted.
12, 14, and 16A.	Plag.-Phyric Basalt	1.0	A	-	3-5% Pg.	——		TR	L	-	Some glass noted with increased Pg abundance.
7 and 10.	Angular Basalt Talus	1.3	A	-	-	——		<1	L	-	No glass.
3, 5, 11, and 13.	"	4.9	A-F	-	2-3% Pg.	——		<1	M	-	Aphanitic rims with near-diabasic cores (Weathering rind?). Phenocrysts occur in centers.
16.	Plag.-Phyric Diabase	33.5	F	-	7-10% Pg.	——		TR-2mm	M	-	1cm weathering rind very apparent.
NOTE:	Samples #6 and #8 — —	are	- -MISSING.								

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 9 DREDGE 9 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
A1, 5, 7, 8 and 20.	Plag.-Phyric Basaltic Glass	0.4	G	-	1-2% Pg.				M	Glass to palagonite.	Angular basaltic glass altering to palagonite.
											Iron oxide stain noted.
1 and 4.	Plag.-Phyric Basalt	0.3	A	-	∿7% Pg.				F	-	Thin glass rim (<1mm) notable (lava tubes?).
1 Bag.	Angular Basaltic Glass Fragments	2.5	G	-	TR - Pg.				L	-	Some show alteration of glass to palagonite.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 10 DREDGE 10 DESCRIBED BY Doug Bergersen DATE 6/18/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1, 3, 4.	Plag.-Phyric Basalt	0.6	A	-	~20% Pg.	—	—	—	F	-	Basalt lava tubes (?) with glass rind (2-6mm). Iron staining noted.
20, 22, 24.	Plag.-Phyric Basaltic Glass	0.1	G	-	15-25%.	—	—	—	F	-	Chips of basaltic glass.
1 Bag.	"	3.4	G	-	"	—	—	—	F	-	"
NOTE:	MISSING SAMPLE - #2.			SAMPLES #20-#24 WERE RE-LABELED LATER BY JOHN BENDER.							

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 11 DREDGE 11 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/19/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
4, 5, 6, 8, 21, and (75 - 79).	Aphanitic Pillow Basalt	32.2	A	-	1-3% Pg.	——		TR	L	-	Fairly fresh glass noted, 5mm thick.
1, 2, 10, 11, 12, 13, 16, 19, 57, (80 - 85).	Aphanitic Pillow Basalt	40.3	A	-	TR - 3% Pg.	——		<1 mm	M	-	Fairly fresh, samplable glass noted beneath complete Mn-coatings. Some weathering rinds noted.
24, 29, 31, 32, 33, 37, 41, 44, 50, 54, 62, 66, 72, 86, 87.	Aphanitic Pillow Basalt	24.8	A	-	TR - 3% Pg.	——		1-2	M	-	Some sample glass beneath slightly thicker Mn-crusts. Pillow structures notable.
9, 14, 15, 17, 22, 23, 27, 28, 30, 34, 45, 48, 53, 55, 58, 59, 60, 61, 63, 65, 67, 68 and 71.	Angular Basalt Talus Fragments	30.2	A	-	TR - Pg.	——		1-2 mm	M	-	Non-descript, Mn-encrusted basalt. Some samples exhibit weathering rinds.
3, 4, 7, 12 and 39.	Basalt	29.9	F	-	TR - 2%.	TR	-	<1	M	-	1cm weathering rinds very apparent. Fine grained cores with aphanitic rims.
20, 35, 43.	Vesicular Basalt	8.7	A-F	-	-	5%	-	<1	L	-	Portions of each of the samples are vesiculated.
25, 51, 56.	Aphanitic Basalt	2.9	A	-	-	——		1-2	M	-	Sheet flow (layered) morphologies noted. Some glass.
18, 26, 36, 38, 49, 52&88.	Basalt	2.9	A-F	-	TR - 3% Pg.	——		——	M	-	Distinct from other samples, No - Mn. Some show weathering rinds surrounding near-diabasic cores.

NOTE: UNLABELLED SAMPLES WERE RE-LABELED CONSECUTIVELY UP FROM #75.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 12 DREDGE 12 DESCRIBED BY Paul Andrew/Doug Bergersen DATE 6/19/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
2.	Aphyric Basalt	0.3	A-F	-	-	——		2-3 mm	L	-	Basalt fragment with Mn layer on one side and core possibly going to diabase.
1, 3, 4, 6, 7, & 9.	Aphyric Basalt	4.5	F	-	-	∿1%	-	<1 mm	M	-	Basalt fragments exhibiting a notable weathering rind and vesicular diabasic(?) core.
5 and 10.	Glassy Basalt	0.4	G	-	-	——		2-5 mm	L	-	Glassy sheets completely coated with thick Mn layer.
1 Bag.	Angular Vesicular Basalt Fragments	1.5	A	-	-	——				-	-
		STATION		13	DREDGE 13						DATE 6/20/85
TWO SAMPLES OF SLIGHTLY SILTY		CLAY.		WEIGHT: 3.9kg.	GREYISH-GREEN	IN	COLOR.				

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 14 DREDGE 14 DESCRIBED BY Doug Bergersen DATE 6/20/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
4.	Pg-Phyric Basaltic Glass	0.6	F	-	1-3% Pg.				F	-	Angular fragments with some iron-staining.
2, 3, 20.	Pg-Phyric Glassy Basalt	1.5	A	-	7-10% Pg.				L	-	Sheet flow character with ~3mm of glass on each side.
1 Bag.	Basalt Glass Fragments	1.0	G	-	-					-	Small chips of glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 15 DREDGE 15 DESCRIBED BY Doug Bergersen DATE 6/20/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1, 2, 3A, 3B and 5.	Aphyric Basalt	20.5	A	-	TR - Pg.	——		TR	L	-	Large basalt talus fragments with Mn stain.
4.	Aphyric Sheeted Basalt	23.1	A	-	TR - Pg.	——		TR	L	Glass to palagonite.	Large angular basalt exhibiting sheet flow structure. Lightly altered and scoured glass (3mm) notable on one side.
8D, 8E.	Pg-Phyric Glassy Basalt	0.3	A	-	1-3% Pg.	TR	——		F	Glass to palagonite.	Basalt lava tube completely covered with a 5-15mm layer of glass. The glass is altered slightly to palagonite and the sample exhibits a vesicular core.
A1, A2, A3, 20 and 22.	Pg.-Phyric Basaltic Glass	0.6	G	-	1-2% Pg.	——	——	——	F	-	-
1 Bag.	Mixed Basalt Glass & Talus Fragments	2.5	-	-	TR - Pg.	——	——	——	——	-	-

		STATION:	16	DREDGE: 16						DATE: 6/21/85
1 and 2	Diabase	23.0	F	-	-	——		<1 mm	M	-	Large sample exhibiting some fresh glass and a ~10mm aphanitic weathering rind. Thinly covered by Mn and sediments.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 17 DREDGE 17 DESCRIBED BY Doug Bergersen/Paul Andrew DATE 6/21/85

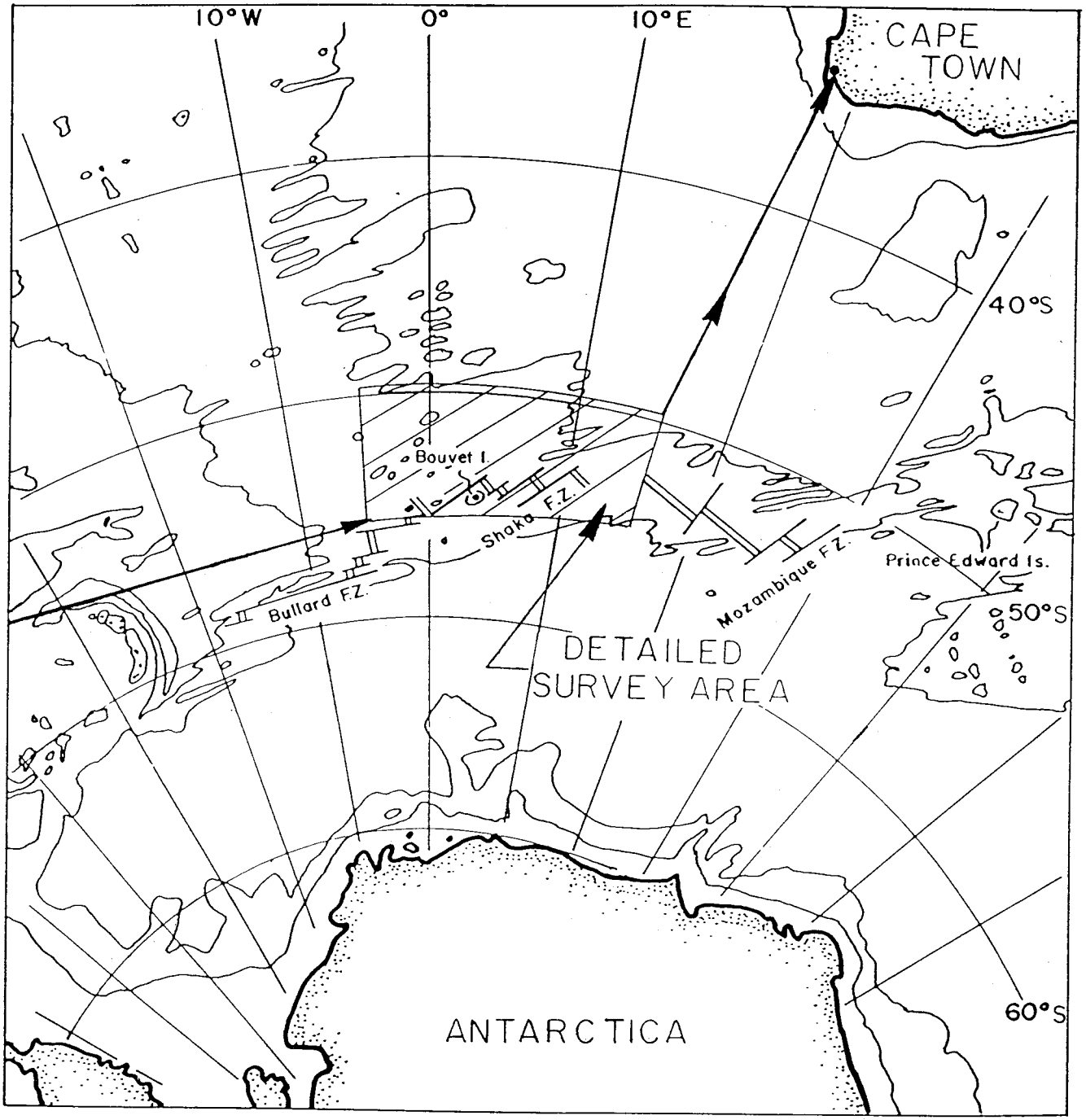
Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1, 2, 4, 6.	Diabase	17.5	F	-	-	1%	-	<1 mm	M	-	Angular samples with prevalent weathering rinds and iron-staining. Patchy Mn. noted.
3, 7,	Diabase	3.0	F	-	-	1%	-	TR	L	-	Samples lightly weathered and Mn-stained.
9, 10, 11&	Unlabeled Fragments.										Thin (1-2mm) weathering rind noted in some samples.
8.	Diabase	-	F	-	-	2%	-	TR	L	-	Vesicular outer surface notable.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE GIL 107 STATION 18 DREDGE 18 DESCRIBED BY Doug Bergersen/Paul Andrew DATE 6/21/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1, 2, 3, 4 and 5.	Plag.-Phyric Pillow Basalt	33.0	A	-	5-7% Pg.	——		TR	F	-	Samples exhibit light iron-staining and ∿2mm of fresh glass. Pillow structure notable.
6.	Basalt	1.0	A	-	3-5% Pg.	——		TR	L	-	Angular talus fragment with iron-staining and traces of Mn.
1 Bag.	Angular Fragments with similar structure and morphology as above	2.3	-	-	3-5% Pg. description.	——		TR	L	-	-

ARA ISLAS ORCADAS 11/76
LEG 1
18 NOVEMBER – 23 DECEMBER



********** STATION DATA RETRIEVAL **********

DATE: 3-DEC-86 14:40

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
ISO	1	1	0045	0000	8	761120	55 37.5'S	3 48.9'W	9	480.53	0045	3600.	3050.	100K	19	0000	0	
ISO	1	1	0047	0000	8	761121	55 36.2'S	3 43.7'W	9	480.53	0047	2150.	1450.	035K	19	0000	0	
ISO	1	1	0048	0000	8	761121	55 41.2'S	3 49.1'W	9	480.53	0048	4390.	3700.	0.1K	19	0000	0	
ISO	1	1	0056	0000	8	761130	54 5.5'S	6 17.1'E	9	515.46	0056	4390.	3650.	045K	19	0000	0	
ISO	1	1	0057	0000	8	7612 1	54 8.3'S	6 29.3'E	9	515.46	0057	3100.	2830.	001K	19	0000	0	
ISO	1	1	0058	0000	8	7612 1	54 4.3'S	6 23.9'E	9	515.46	0058	3580.	2960.	112K	19	0000	0	
ISO	1	1	0059	0000	8	7612 1	54 3.4'S	6 30.0'E	9	515.46	0059	2520.	2340.	150K	19	0000	0	
ISO	1	1	0060	0000	8	7612 1	54 2.7'S	6 29.2'E	9	515.46	0060	2780.	2500.	159K	19	0000	0	
ISO	1	1	0061	0000	8	7612 1	53 59.7'S	6 25.0'E	9	515.36	0061	4720.	4570.	003K	19	0000	0	
ISO	1	1	0062	0000	8	7612 2	53 54.2'S	6 20.5'E	9	515.36	0062	2835.	2300.	054K	19	0000	0	
ISO	1	1	0063	0000	8	7612 2	53 51.5'S	6 24.1'E	9	515.36	0063	3110.	2560.	004K	19	0000	0	
ISO	1	1	0075	0000	8	7612 9	52 54.0'S	11 23.3'E	9	514.21	0075	1940.	1760.	010K	19	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 45 DREDGE 3 DESCRIBED BY Paul Andrew DATE March 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
192	Basalt Fragment	0.1	A	-	-	——		1	L	-	-
23	Aphyric Basalt	0.3	F	-	TR - Pg.	TR	-	TR	M	-	-
29, 74	"	0.2	F	-	"	——		TR	L	-	-
33, 91	Basalt	0.5	F	-	2% - Pg, TR-Ol.	TR	-	TR	M	-	Weathering rings apparent, Mn-stain noted.
60, 71, 137, 154, 186	Aphyric Basalt	0.3	F	-	TR - Pg.	——		TR-0.2	M	-	"
26, 38, 66, 75, 87, 96, 101,111,112, 113,126,142, 163,177,179, 181,188,196	Angular Basalt Fragments	4.0	F	-	TR - Pg.	——		TR-0.1	M	-	Some exhibiting weathering rinds.
145	Aphyric Basalt	0.2	F	-	-	2%	-	0.2	M	-	Attached brecciated basalt. Clear 5mm weathering rind.
42, 47, 70, 78, 86, 89, 97,139,151, 157,162,193	Plag. Phyric Basalt	5.0	F	-	3-7% Pg, TR - 2% Ol.	TR	-	TR-0.2	M	-	Weathering rings apparent.
35, 72,120, 147, 152	Ol - Phyric Basalt	12.5	F	-	7-10% Pheno's. Ol > Pg.	TR	-	TR-0.1	M	-	Weathering rings apparent.
1, 41, 62, 150,153,189	Plag. Phyric Basalt	3.0	F	-	3-5% Pg.	——		TR-0.1	H	-	-
57	"	0.1	F	-	20% Pg.	——		0.1	L	-	Fractured.
*RED	Basalt	1.2	F	-	2% - Pg.	——		0.2	M	-	Red color.
19,65,81,82, 92,100,105, 110,119,123, 155,165,175, 176,177,178	Diabase	3.0	M	-	-	——		TR-0.1	H	-	Angular fragments.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 45 DREDGE 3 DESCRIBED BY Paul Andrew DATE March 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
94,182	Diabase	0.3	M	-	-			TR	L	-	Angular fragments.
11,30,43,58, 59,68,107, 109,206,207, 208	"	5.0	M	-	-			TR-0.2	M	-	Weathering rinds apparent.
20, 44	Plag. Phyric Diabase	0.5	M	-	10% - Pg.			0.1	M	-	-
13,34,80, 154,167,195	"	9.0	M	-	"			0.1	L	-	-
172	Diabase	5.7	C	-	-			0.1	L	-	-
2,14,35,53, 55,94,102, 136,145,185	Greenstone	5.0	A	-	-			TR-0.2	L	GR.	-
93	Greenstone	0.3	A	-	-			TR	M	GR.	Attached greenstone breccia. Light weathering rind notable.
118	Greenstone	2.2	A	-	5% lineated Pg.			0.1	L	GR.	Deformed plag.
5,6,16,18, 36,95,164, 166	"	7.5	F	-	Some with TR - Pg.			TR-0.2	M	GR.	Most exhibit weathered fractures and deep weathering rinds.
83, 103	Greenstone	0.1	F	-	-			0.1	M	GR.	Small angular fragments.
3, 160	"	7.0	F	-	Large (3%) - Pg.			TR	M	GR.	-
4,12,24,25, 27,45,54,76, 98,106,125, 127,131,138, 140,171,173, 191, 198	Diabasic Greenstone	9.0	M	-	-			TR-0.2	L	GR.	Most all grains are close to 1mm in size.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 45 DREDGE 3 DESCRIBED BY Paul Andrew DATE March 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
17,28,40,77, 84,88,133, 174,180,190	Diabasic Greenstone	2.3	M	-	-	—		TR-0.1	L	GR.	Small angular fragments.
8,15,49,67, 85,99,121, 122,129,134, 141,143,170 187,204	Plag. Phyric Diabasic Greenstone	17.3	M	-	1-5% Pg.	—		TR-0.2	L	GR.	-
22,32,52,56, 135,159,168	Diabasic Greenstone	14.5	M	-	-	—		TR-0.1	L	GR.	Most all grains are between 2-3mm in size.
21,50,51, 144,148	Plag. Phyric Diabasic Greenstone	10.0	M	-	2% - Pg.	—		TR-0.1	L	GR.	-
9,61,205	Metabasalt	0.5	F	-	-	—		TR	M	-	Overall brown color.
7,46,90, 132, 184	Metadiabase	1.4	M	-	-	—		TR-0.1	M	-	"
36,64,69, 115, 117	Plag. Phyric Metadiabase	3.0	M	-	1-3% Pg.	—		TR-0.2	M	-	"
130,157,199, 200,201,202	Pumice	2.5	A	-	-	50%	-	TR	L	-	Five black species, one white species.
10,31,39,79, 88,108,156, 158,161,194, 203	Greenstone Breccia	5.0	F-M	-	TR.	—		TR-0.2	L	-	Highly jointed to brecciated greenstones.
167	Glacial Erratic	3.2	M	Qtz. grains.	-	—			L	-	Quartzite.
149	"	2.0	M	Qtz. and Feldspar.	-	—			L	-	Layered arkosic quartzite.
20,48,63	"	0.7	C	"	-	—			L	-	Felsic igneous.
73	"	0.2	M	Pg. and Px.	-	—			L	-	Mafic igneous.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 45 DREDGE 3 DESCRIBED BY Paul Andrew DATE March 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
37,47,103, 114	Glacial Erratic	1.1	F	-	-				L	-	Felsic metamorphic?
197	"	1.1	F	-	-				L	-	Layered metamorphic.
121	"	0.3	A	-	-				L	-	Shale.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 47 DREDGE 4 DESCRIBED BY Doug Bergersen/Paul Andrew DATE 5/29/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
25,27,72,73, 108	Metabasalt	2.5	A	-	Aphyric.	—		TR	L	-	Dark, aphanitic, aphyric basalt with trace manganese.
28,44,70	Metabasalt	1.0	A	-	Aphyric.	—		<1	M	-	Dark, aphanitic, aphyric basalt with manganese.
16	Pg. Phyric Basalt	0.3	A	-	2% Pg.	—		3	L	-	Mn noted on one surface.
30,51,52,54, 62,64,100, 111, 112	"	3.0	A	-	2 - 3% Pg.	—		TR	L	-	-
63	Pg. Phyric Basalt	2.7	A	-	2% Pg.	—		<2	M	-	Weathering rind apparent.
8,21,31,43, 47,76,114	Diabase	2.0	F-M	Pg.	-	—		<1	L	Some Gr.	A few samples exhibit notable botryoidal Mn.
26, 88	Pg. Phyric Diabase	0.5	F-M	Pg.	1% Pg.	—		TR	L	"	-
42,83,85,89	"	0.6	F-M	Pg.	3% Pg.	—		<1	M	"	Similar to 26, 88 with increased weathering noted.
5,32,36,40, 46,49,80, 105	"	3.0	M	Pg.	3 - 5% Pg.	—		TR-2	M	-	-
24,41,75,78, 81,82,101, 106, 110	Greenstone	1.3	F	-	-	—		1-3	L-M	Gr.	Variable weathering noted.
2,3,7,9,17, 56,57,86, 107	Greenstone	7.0	M	Pg.	3 - 5% Pg.	—		1-3	M-H	Gr.	Greenish color less noticeable.
66	Greenstone	0.9	A	-	-	—		3	M	Gr.	Massive.
34,90,92,113	Diabasic Greenstone	0.1	M	Pg+Chlorite.	-	—		<1	L	Gr.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 47 DREDGE 4 DESCRIBED BY Doug Bergersen/Paul Andrew DATE 5/29/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Greenstone	3.5	A	-	-	——		1	M	Gr.	Brecciated and jointed with one crack exhibiting a 3cm weathering rind.
11,14,35,87, 102, 103	Brecciated Greenstone	2.6	F	-	1 - 2% Pg.	——		1-10	M	Gr.	Many fragments are cemented by Mn.
37	Greenstone	0.1	F	-	-	——			H	Gr.	Crumbly nature.
38, 45	Pumice	0.5	A	-	No. 45: 5% Pg.	50%	-	1	M	-	No. 38 - exhibits a pumice core.
22, 39	Ol - Pg Phyric Basalt	1.3	A	-	1% - Ol, 3-5% Pg.	1%	-	TR	L	-	No. 22 - well rounded.
23	Greenstone	0.5	A	-	15% large (5mm) Pg.	——		TR	M	Gr	-
55	Metadiabase	8.5	F	-	Pg (some).	——		1	M	-	Red layered stain throughout. Keystone fracturing noted.
29	Glacial Erratics	1.4	C	Pg & Qtz.	-	——		2	L	-	Felsic igneous.
6	"	-	M-C	Pg + Qtz.	-	——		TR	L	-	"
18, 68	Felsic Gneiss - Erratic	2.5	C	Kspar + Biotite.	-	——		TR	L	-	Glacial Erratic.
34,53,69	Glacial Erratic	2.0	C	Qtz. & Kspar.	-	——		TR	L	-	Felsic gneiss.
59	"	3.4	C	Qtz. & Plag.	-	——		TR	L	-	Similar to #48. Felsic igneous (gabbro?).
104	"	1.6	C	Qtz. & Pg.	Pg.	——		TR	L	-	Igneous.
1 box	Angular Talus Fragments-Basalt	30	-	-	-	——		1-10	M	-	Notable Mn-Crust. 1 box unnumbered samples.
48	Glacial Erratic	0.1	M	Pg & Qtz.	-	——			L	-	Rounded - Felsic igneous (gabbro?).
109	"	1.8	M	-	Pg - 3-5%	——		0.1	L	-	Felsic igneous.

NOTE: Some samples were given new I.D. numbers and labeled consecutively from No. 102-114.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 56 DREDGE 7 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Harzburgite	0.1	C	-	-			1-2	M	80% Serp.	Islands of weathered Hz in black serpentine.
2	Red Chert	0.05	A	-	-		5%	-	F	-	Erratic?
3	Harzburgite	0.6	C	-	-			1-3	M	4% Serp.	-
4	"	0.1	C	-	-			1	M	3% Serp.	-
5	"	0.1	C	-	-			2-3	M	10% Serp.	Little Cpx noted.
6	"	0.8	C	-	-			1-3	M	5% Serp.	Some Cpx. 3mm serpentine vein noted.
7	"	0.5	C	-	-			1-5	M	"	3mm spinel with possible corona.
8	"	0.1	C	-	-			<1	M	10% Serp.	Small serp. veins.
9	Harzburgite - dunite	0.1	C	-	-			<1	M	"	Little Px.
10	Harzburgite	0.3	C	-	-			1	M	20% Serp.	30% Opx.
11	"	0.2	C	-	-			1-3	M	"	10 - 15% Opx.
12	"	0.2	C	-	-			1	M	"	15% Opx.
13	"	0.2	C	-	-			<1	M	"	10% Opx.
14	"	0.05	C	-	-			1	M	"	15% Opx.
15	"	0.1	C	-	-			1	M	"	8% Opx.
16	"	0.1	C	-	-			1	M	40% Serp.	15% Opx.
17	"	0.05	C	-	-			1	M	20% Serp.	"
18	"	0.5	C	-	-			<1	M	90% Serp.	10% Opx - black serpentine.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 56 DREDGE 7 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19	Harzburgite	0.2	C	-	-			1	M	20% Serp.	Small veinlet Cpx?
20	"	0.08	C	-	-			<1	M	20% Serp.	-
21	"	1.5	C	-	-			1-3	M	30% Serp.	10% Opx.
22	"	0.4	C	-	-			1	H	10% Serp.	8% Opx.
23	"	0.8	-	-	-			1	M	50% Serp.	Crisscrossed w/ serpentine veins. Possible Pg.
											10% Opx.
24	Harzburgite	1.7	C	-	-			1-2	H	10% Serp.	8% Opx.
25	"	1.0	C	-	-			1-2	M	15% Serp.	15% Opx.
26	"	2.4	C	-	-			1	M	25% Serp.	10% Opx.
27	"	0.5	C	-	-			1	M	25% Serp.	15% Opx.
28	"	0.5	C	-	-			1-3	M	20% Serp.	10% Opx.
29	"	1.2	C	-	-			1	M	20% Serp.	Parallel serp. veins. 15% Opx.
30	"	0.5	C	-	-			5	H	20% Serp.	15% Opx.
31	"	0.3	C	-	-			1	M	35% Serp.	10% Opx.
32	"	0.2	C	-	-			2-4	M	50% Serp.	15% Opx.
33	"	0.1	C	-	-			1	H	20% Serp.	8% Opx.
34	Aplite	0.4	M	-	-			<1	F	-	Pg + Qtz. Erratic? Sub-angular.
35	Harzburgite	0.1	C	-	-			3	M	60% Serp.	15% Opx.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 56 DREDGE 7 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
36	Harzburgite	0.2	C	-	-			1	L-M	10% Serp.	15% Opx.
37	"	0.5	C	-	-			1-5	M-H	?	? Opx - Pyroxene?
38	"	0.5	C	-	-			<1	L-M	15% Serp.	25% Opx.
39	"	0.08	C	-	-			<1	M	20% Serp.	15% Opx.
40	"	0.3	C	-	-			1	H	15% Serp.	20% Opx.
41	Rodingite	0.4	C	-	-			1	F	Gr.	5 cm vein, zoned with blackwall.
42	Harzburgite	0.5	C	-	-			1	L	85% Serp.	Small mt veins. Px almost gone → serp.
43	"	0.3	C	-	-			1	M	25% Serp.	10% Opx.
44	"	0.4	C	-	-			1	M	20% Serp.	10% Opx.
45	"	0.6	C	-	-			1	M	45% Serp.	Large serp. vein 1-1/2 cm thick at top. 15% Opx.
46	Hornblende Diorite	0.5	M	-	-			2	L	-	Erratic.
47	Hornblende Diabase	0.6	M	-	-			1	F	-	Erratic?? Sug-angular.
48	Harzburgite	0.08	C	-	-			1-3	M-H	15% Serp.	15% Opx.
49	"	0.6	C	-	-			1	L-M	25% Serp.	20% Opx.
50	"	0.9	C	-	-			2	L-M	40% Serp.	30% Opx.
51	"	2.4	C	-	-			2	M	15% Serp.	25% Opx.
52	"	1.9	C	-	-			1-5	M	20% Serp.	Edge of Rodingite vein. 15% Opx.
53	"	0.5	C	-	-			1	M	30% Serp.	10% Opx.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 56 DREDGE 7 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
54	Harzburgite	0.4	C	-	-			2	H	25% Serp.	15% Opx.
55	"	0.3	C	-	-			1	M	20% Serp.	15% Opx.
56	"	0.6	C	-	-			1-4	VH	"	15% Opx.
57	"	0.6	C	-	-			1	M	25% Serp.	20% Opx.
58	"	13.6	C	-	-			~3	M-H	-	Uncut boulder. Angular.
59	1 Box Small Angular Talus Fragments (unlabeled) - Similar to Other Samples.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 57 DREDGE 8 DESCRIBED BY Doug Bergersen DATE 6-3-85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Glacial Erratic	0.45	A	-	-				M	-	Well-rounded basaltic fragment. Weathering rind noted.
2	Glacial Erratic	0.45	F	Qtz. & Pg.	-				L	-	Dacite (?) - fragment with Mn-stain.
3, 4	Pumice	0.2	A	-	-	30				-	2 fragments of pumice.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 58 DREDGE 9 DESCRIBED BY H.J.B. Dick DATE June 1986

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Harzburgite	0.5	C	-	-			<.1	M	20% Serp.	15% Opx.
2	"	0.08	C	-	-			<.1	M	50% Serp.	"
3	"	0.9	C	-	-			1.0	L-M	80% Serp.	10% Opx.
4	"	0.2	C	-	-				M-H	15% Serp.	8% Opx.
5	"	0.5	C	-	-			1.0	L-M	85% Serp.	10% Opx. Serp.-P bands. Angular.
6	"	0.2	C	-	-				L	40% Serp.	15% Opx.
7	"	0.4	C	-	-			1.0	L	80% Serp.	10% Opx.
8	"	0.3	C	-	-			<.1	M	10% Serp.	"
9	"	0.6	C	-	-				M	75% Serp.	Full of veins.
10	"	0.6	C	-	-			∿.1	M-H	10% Serp.	15% Opx.
11	Trachybasalt	0.9	A	-	-	5%			F	-	Reddish cast.
12	Harzburgite	0.6	C	-	-			0.1	L-M	20% Serp.	15% Opx.
13	"	0.08	C	-	-			<.1	M	75% Serp.	Angular.
14	"	0.1	C	-	-			<.1	M	25% Serp.	20% Opx.
15	"	0.08	C	-	-			<.1	L	98% Serp.	Angular.
16	"	0.4	C	-	-			<.1	M	35% Serp.	20% Opx.
17	"	1.2	C	-	-			1.0	L	75% Serp.	Angular.
18	"	0.5	C	-	-			<.1	L-M	20% Serp.	15% Opx.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 58 DREDGE 9 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19	Harzburgite	0.08	C	-	-				M	20% Serp.	10% Opx.
20	"	0.05	C	-	-			0.1	M	20% Serp.	10% Opx.
21	"	0.6	C	-	-			0.2	M	20% Serp.	Angular. 15% Opx.
22	"	0.05	C	-	-			<.1	M	80% Serp.	Angular.
23	"	0.6	C	-	-				L-M	30% Serp.	18% Opx.
24	Harzburgite Rodingite	0.1	C	-	-			<.1	L-M	60% Serp.	1-1/2cm thick rodingite vein. Angular.
25	Harzburgite	2.4	C	-	-			<.1	M	45% Serp.	10% Opx.
26	"	0.4	C	-	-			<.1	M	35% Serp.	15% Opx.
27	"	0.1	C	-	-			<.1	F-M	90% Serp.	Angular.
28	"	0.5	C	-	-			<.1	M	20% Serp.	10% Opx.
29	"	1.2	C	-	-			<.1	F-M	35% Serp.	15% Opx. 1/3cm Serp. vein along edge. Angular.
30	"	0.6	C	-	-			<.1	F-M	25% Serp.	25% Opx, foliation. Angular.
31	"	0.3	C	-	-			.2	F-M	25% Serp.	12% Opx.
32	"	0.3	C	-	-			<.1	F-M	90% Serp.	Angular.
33	"	0.1	C	-	-			<.1	F-M	30% Serp.	10% Opx.
34	"	5.4	C	-	-			<.1	F-M	25% Serp.	18% Opx.
35	"	0.05	C	-	-			0.1	L	90% Serp.	Sub-angular.
36	Diabase	0.9	M	-	-			<.1	L	Saussurite.	Sub-angular. Erratic.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 58 DREDGE 9 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
37	Harzburgite	0.1	C	-	-			<.1	M	40% Serp.	15% Opx.
38	"	0.1	C	-	-			<.1	M	20% Serp.	"
39	"	0.08	C	-	-			<.1	M	25% Serp.	"
40	"	0.6	C	-	-				M	35% Serp.	"
41	"	0.1	C	-	-			.1	M	40% Serp.	"
42	"	0.1	C	-	-			.2	L-M	55% Serp.	Angular.
43	"	0.08	C	-	-				H	20% Serp.	Angular.
44	"	0.1	C	-	-			<.1	M	25% Serp.	12% Opx.
45	"	0.1	C	-	-			<.1	L	90% Serp.	Angular.
46	"	0.4	C	-	-			1.0	L-M	40% Serp.	15% Opx.
47	"	0.05	C	-	-			.3	M	98% Serp.	Angular.
48	Banded augen gneiss	0.1	C	-	Cpx.					Prehnite.	Ol-cpx-pg gabbro. Angular.
49	Hornblende gabbro	0.3	C	-	-				L	Saussurite.	Possible erratic. Sub-angular.
50	Rodingite	0.08	C	-	-			<.1	M-H	Rodingite.	1-1/2 cm vein with ser-pentinized harzburgite.
51	Harzburgite	6.4	C	-	-			.2	M	50% Serp.	15% Opx.
52	"	0.1	C	-	-			<.1	M	"	"
53	"	0.1	C	-	-			1.0	M	20% Serp.	10% Opx.
54	"	0.08	C	-	-			<.1	M	50% Serp.	15% Opx.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 58 DREDGE 9 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
55	Harzburgite	0.3	C	-	-			.1	M	70% Serp.	White veins in serpentine harzburgite. Angular.
56	"	0.08	C	-	-			<.1	M	85% Serp.	Angular.
57	"	0.1	C	-	-			<.1	M	40% Serp.	Angular.
58	"	4.5	C	-	-			<1	M	20% Serp.	Uncut boulder. Angular.
59	"	54.5	C	-	-			1-2	M	<25% Serp.	" "
60	"	5.4	C	-	-			1-3	M-H	?	" "
61	"	4.1	C	-	-			<1	M	?	Chlorite on outside. Uncut boulder. Angular.
62	"	0.5	C	-	-			1-3	M-H	?	"
63	"	1.2	C	-	-			<1	M	?	"
64	"	3.2	C	-	-			<1	M	?	"
65	"	6.4	C	-	-			1	M	<25% Serp.	"
66	"	0.08	C	-	-			<.1	M	80% Serp.	Angular.
67	"	0.05	C	-	-			<.1	M	25% Serp.	10% Opx.
68	"	0.08	C	-	-			0.1	M	50% Serp.	15% Opx.
69	"	0.05	C	-	-			0.1	M	90% Serp.	Angular.
70	"	0.05	C	-	-			<.1	M	85% Serp.	Angular.
71	"	0.08	C	-	-			<.1	M	65% Serp.	15% Opx.
72	"	0.08	C	-	-			<.1	M	12% Serp.	10% Opx.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 58 DREDGE 9 DESCRIBED BY H.J.B. Dick DATE June 1985

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
73	Harzburgite	0.05	C	-	-			.1	M	35% Serp.	12% Opx.
74	"	0.08	C	-	-			<.1	M	40% Serp.	15% Opx.
75	"	0.1	C	-	-			<.1	M	30% Serp.	20% Opx.
76	"	0.1	C	-	-			<.1	M	55% Serp.	15% Opx.
77	"	0.05	C	-	-			<.1	M	20% Serp.	Angular.
78	"	0.1	C	-	-			<.1	M	50% Serp.	10% Opx.
79	"	0.1	C	-	-			.2	M	70% Serp.	Angular.
80	"	0.1	C	-	-			<.1	M	75% Serp.	Angular.
81	"	0.08	C	-	-			.1	M	80% Serp.	Angular.
82	"	0.08	C	-	-			<.1	M	80% Serp.	15% Opx.
83	"	0.1	-	-	-			<.1	M	100% Serp.	Brecciated. Angular.
84	"	0.08	C	-	-			<.1	M	85% Serp.	15% Opx.
85	"	0.08	C	-	-			.1	M	85% Serp.	Angular.
86	"	0.1	C	-	-			<.1	M	25% Serp.	10% Opx.
87	"	0.08	C	-	-			<.1	M	40% Serp.	25% Opx.
88	"	0.1	C	-	-			<.1	M	55% Serp.	20% Opx.
89	"	0.1	C	-	-			<.1	M	25% Serp.	10% Opx.
90	"	0.05	C	-	-			<.1	M	90% Serp.	Angular.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 59 DREDGE 10 DESCRIBED BY D. Bergersen/P. Andrew DATE 5/31/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19,22,38, 40,43,67,73	Serpentinized Peridotites	6.8	C	(20% Black) Serpentine.	10-15% Px (Phenoclasts).	X	X	0.1	L	Ol to Serp.	Mn-stained. Blastoporphyritic texture. Nos. 38&40 show good interconnecting serpentine-filled fractures.
5,10,13,37, 39,51,53,54, 59,61,62,70, 72,74,76,80, 83,86,92,93, 97,101,102, 110,117,125, 127,129,133	Serpentinized Peridotites	18.4	C	(15% Black) Serpentine.	15-20% Px (Phenoclasts).	X	X	0.1	L	Ol to Serp.	"
8,24,32, 123,131	Serpentinized Peridotites	14.1	C	-	15-20% Px (Phenoclasts).	X	X	0.1	L	Ol to Serp.	Mn-stained. Blastoporphyritic texture. Exhibits massive serpentine with slickensides.
1,14,15,33, 42,44,45,48, 57,58,65,66, 68,72,78,85, 89,99,111, 112,115	Serpentinized Peridotites	5.8	C	(60% Black) Serpentine.	5-10% Px (Phenoclasts).	X	X	0.1	M	Ol to Serp.	Mn-stained. Blastoporphyritic texture. No. 99 contains a well defined serpentine vein.
2,6,12,18, 21,27,41,55, 60,84,102, 106,119	Serpentinized Peridotites	9.0	C	(50% Black) Serpentine.	10-15% Px (Phenoclasts).	X	X	0.1	M	Ol to Serp.	Mn-stained. Blastoporphyritic texture.
3	Serpentinized Peridotite	7.6	C	(55% Black) Serpentine.	20% Px (Phenoclasts).	X	X	0.1	M	Ol to Serp.	Mn-stained. Blastoporphyritic texture. Prominent slickensides composed of massive serpentine.
4,64,87,128	Serpentinized Peridotites	4.4	-	(5% Black) Serpentine.	10-15% Px (Phenoclasts).	——		TR	H	Ol to Serp.	Overall lt. green color with a white alteration rind.
103	Peridotite	3.4	C	-	30% Px.	——		TR	L	Slight Ol to Serp.	Mn-stained. Fresh sample.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 59 DREDGE 10 DESCRIBED BY D. Bergersen/P. Andrew DATE 5/31/8

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
56,75,81, 107	Serpentine	2.1	C	-	Some distinguishable Px.	X	X	0.1	M	Ol. to Serp.	Convolute texture. Highly veined.
94,105	"	-	C	-	Scattered Px.	———		0.1	M	Ol + Px to Serp.	Branching black serpentine veins. No. 105 shows a whitish alteration rind and slickensides.
91	Serpentine	0.1	C	Serpentine.	TR - Relic Px phenoclasts.	X	X	TR	M	Ol + Px to Serp.	Black serpentine core with green serpentine rind.
46,63	"	0.45	C	"	-	X	X	TR	L	Ol + Px to Serp.	Massive.
20,69,104	Serpentinized Peridotites	0.5	C	-	5% - Relic Px phenoclasts.	X	X	TR	M	"	All samples exhibit prominent white veins.
16,34	Serpentine	0.1	C	Serpentine.	Scattered relic Px.	X	X	TR	L	"	Thicker veined (1-2mm) serpentine than previous.
121,126	Serpentinized Peridotites	1.5	C	-	5% - Relic Px phenoclasts.	X	X	TR	M	"	All samples exhibit highly altered veins (∿2cm wide).
50,52,76, 100,108,114, 116,118,120, 124,132	Rodingite(?)	7.8	C	-	15-20% Px phenoclasts.	X	X	0.1	M	Ol to Serp.	Most samples exhibit white fiberous mats (asbestos?) on surface. Also, this group is characterized by a greasy feel and an overall blue sheen.
11,113	Erratic?	0.9	F	-	Some clasts noted.	X	X	TR	L	-	White-radiating fibers compose these samples.
82	Serpentine	0.1	-	Massive serpentine.	-	X	X	TR	M	-	Weathering rim notable. Light green color.
7	Erratic ?	0.2	A	-	4% Pg.	X	X	-	L	-	Basalt fragment-rounded. Weathering rind notable.
130	"	0.1	A	-	-	50%	X	TR	L	-	Pumice.
NOTE:	UNLABELED SAMPLES WERE RE-LABELED CONSECTIVELY FROM NO. 128 AND UP.										

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 60 DREDGE 11 DESCRIBED BY D. Bergersen/P. Andrew DATE 6/5/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
16,19,20,31, 40,42,58,60, 68,72,76,85 86,91,92,97 102,104,105, 111,119,120, 131,133,135, 137,138,139, 142,143,145, 146,147,156, 160,168,171	Serpentinized Peridotite	20.0	C	(90% Black) Serpentine.	2-5% Px phenoclasts.	——		TR	M	Ol + Px to serpentine.	Some samples show TR of Mn-Fe oxides. All exhibit micro-fractures. Blasto-porphyritic texture.
21,26,47, 66,67,117, 122,127,129, 132,175	Serpentinized Peridotite	5.5	C	(80% Black) Serpentine.	5-8% Px phenoclasts.	——		TR	M	Ol + Px to serpentine.	Some samples show TR of Mn-Fe oxides. All exhibit micro-fractures. Blasto-porphyritic texture.
24,27,35, 124,126,130, 162,163	Serpentinized Peridotite	9.5	C	(70% Black) Serpentine.	15-20% Px phenoclasts.	——		TR	M	Ol + Px to serpentine.	Some samples show TR of Mn-Fe oxides. All exhibit micro-fractures. Blasto-porphyritic texture.
53,62,75,82 128,154	Serpentinized Peridotite	3.0	C	(90% Black) Serpentine.	3-5% Px phenoclasts (dun-colored).	——		TR	M	Ol + Px to serpentine.	Some samples show TR of Mn-Fe oxides. All exhibit micro-fractures. The phenoclasts are characterized by dun-colored reaction rims. Blastoporphyritic texture.
29,41,63, 87,89,113	Serpentinized Peridotite	16.0	C	(80% Black) Serpentine.	7-10% Px phenoclasts (dun-colored).	——		TR	M	Ol + Px to serpentine.	Some samples show TR of Mn-Fe oxides. All exhibit micro-fractures. The phenoclasts are characterized by dun-colored reaction rims. Blastoporphyritic texture.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 60 DREDGE 11 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/5/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
52	Serpentinized Peridotite	0.6	C	(60% Black) Serpentine.	30% Px phenoclasts (dun - colored).	—	—	—	M	Ol. + Px to serpentine.	Micro-fractures noted. Phenoclasts are characterized by dun—colored reaction rims. Blastoporphyritic texture.
36,96	Serpentinized Peridotite	0.9	C	(10% Black - 85% Green) Serpentine.	3% Px phenoclasts.	—	—	TR	M	Ol + Px to serpentine.	Blastoporphyritic texture. Green serpentine matrix with lesser black serpentine veining.
46,55,116	Serpentinized Peridotite	1.2	C	(5% Black - 80% Green) Serpentine.	12-15% Px phenoclasts.	—	—	TR	M	Ol + Px to serpentine.	Blastoporphyritic texture. Green serpentine matrix with lesser black serpentine veining.
37,166	Serpentinized Peridotite	10.0	C	(5% Black - 85% Green) Serpentine.	10% Px phenoclasts (dun - colored).	—	—	TR	M	Ol + Px to serpentine.	Green serpentine matrix. Some black serpentine noted. The phenoclasts are characterized by dun - colored reaction-rims. Blastoporphyritic texture.
22,157,159	Serpentinized Peridotite	2.3	C	(5% Black - 80% Green) Serpentine.	12-15% Px phenoclasts.	—	—	TR	M	Ol + Px to serpentine.	Highly jointed by micro-fractures. Foliated appearance. Blastoporphyritic texture.
69,83,140, 149	Serpentinized Peridotite	2.3	C	(TR - Black 95% Green) Serpentine.	2% very relic Px-phenoclasts.	—	—	0.5	M	Ol + Px to serpentine.	Highly jointed by micro-fractures. Foliated appearance. Blastoporphyritic texture.
33,49,125	Serpentinized Peridotite	1.0	C	(70% Black) Serpentine.	~25% highly embayed px phenoclasts.	—	—	0.1	M	Ol + Px to serpentine.	Black serpentine matrix. Blastoporphyritic texture.
94,95,114, 153,169,170	Serpentinite	9.7	-	Massive serpentine.	-	—	—	TR	M	All serpentine.	Many micro-fractures. Both green and black serpentine noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 60 DREDGE 11 DESCRIBED BY P. Andrew/D. Bergersen DATE 6/5/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
15,28,34, 44,51,70,	Serpentinized peridotite (harzburgite)	5.6	C	(2% black-65% greenish)	25-30% Px phenoclasts.	—	—	TR	M	Ol + Px to serpentine.	Matrix is largely dun—colored with phenoclasts
77,88,98, 101,103,109,				Serpentine.							exhibiting dun—colored reaction rims. Blasto-
115,151,155, 174											porphyritic texture.
17,18,38, 39,45,56,	Serpentinized peridotite (harzburgites)		C	(TR-Black, 80% dun colored)	15-20% Px phenoclasts.	—	—	1-2	H	Ol + Px to serpentine.	Matrix is all dun—colored with the phenoclasts exhi-
61,90,93, 99,112,134,				Serpentine.							biting rust-colored re- action rims. Blastopor-
136,148,152, 161,172,173											phyritic texture.
23,32,43, 50,100,106,	Serpentinized peridotites	9.7	C	(90% Black) Serpentine.	3-5% Px phenoclasts.	—	—	TR	M	Ol + Px to serpentine.	Blastoporphyritic texture. All samples exhibit light
141,158,165											green veins. (Re-crystal- lized serpentine.)
30,48,64, 74,84,110,	Serpentinized peridotites	3.2	C	(50% Green— 40% Black)	1-3% Px phenoclasts.	—	—	TR	M	Ol + Px to serpentine.	Blastoporphyritic texture. All samples exhibit light
121,144,150				Serpentine.							green veins— (Re-crystal- lized serpentine), as
											well as an overall green- ish color.
57,65.73, 80,118,123	Serpentinized peridotites	3.5	C	-	5% Px phenoclasts.	—	—	<1	H	Ol + Px to serpentine.	All samples exhibit heavily altered bands. (Weathered
											veins?)
54,59,78, 79,145	Serpentinized peridotites	3.7	C	(90% Black) Serpentine.	3-5% Px phenoclasts.	—	—	TR	L	Ol + Px to serpentine.	5-8mm green weathering rind noted. (Well crystal-
											lized serpentine.)
(5-10),81	Amphibolites	3.9	F	-	Pg laths and mafic minerals.	—	—	TR	L	Tectonized.	Well foliated. Some samples exhibit infilled veins.
2,3,13	Aphyric basalt	1.0	A	-	TR-2% Pg.	—	—	<1	L	-	-
1	Ol + PG phyric Basalt	0.6	A	-	3% Ol , 3% Pg.	—	—	TR	L	-	--

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO 11-76 STATION 63 DREDGE 14 DESCRIBED BY D. Bergersen/P. Andrew DATE 6-4-85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Aphyric Basalt	0.8	A	-	-	——		TR	F		Lightly weathered band noted in center of sample.
2	Greenstone	2.0	F	-	TR Pg.	——		2	F	GR.	Contains scattered Pg. phenocrysts and cross-cutting thin white veins.
3	Pg. Phyric Basalt	0.5	A	-	(2%) Pg.	7%	——		L	-	-

		STATION:	75	DREDGE:	15						DATE: 6-4-85
3,4,5,6,7, 8,9,10	Aphyric Basalt	1.6	A	-	-	5%	-	<1	L	Glass to Palagonite.	Vesicles prevalent and lineated upwards. Exhibits a glassy rind (1-3mm). Pillow structure noted.
1,2	Aphyric Basalt	0.45	A	-	-	3%	-	TR	L	-	Mn-stained. Angular fragments with no glass.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 62 DREDGE 13 DESCRIBED BY D. Bergersen/P. Andrew DATE 6/3/85

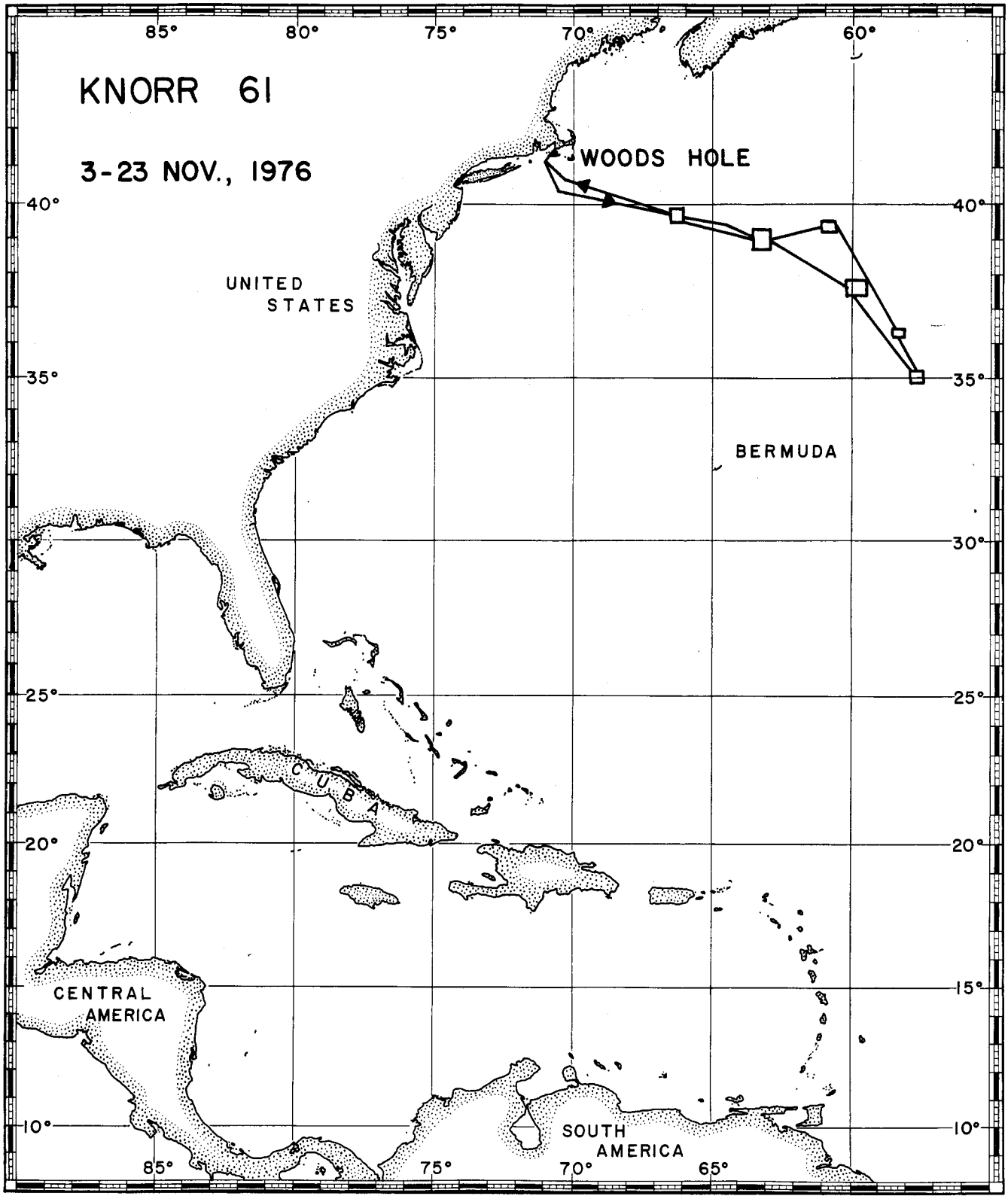
Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
9,16,18, 22,24,25,	Aphyric Basalt	2.7	A	-	-	<1%	-	TR	L	-	Aphyric, aphanitic basalt with scattered Mn-patches.
27,32,36, 37,39											A few vesicles present.
11,15,23, 28,33,35	Aphyric Basalt	0.9	A	-	TR - Pg.	<1%	-	TR	L	-	Mn in scattered patches and a few vesicles present.
5,7,10,12, 13,17,20,26,	"	2.2	A	-	TR - Pg.	1-3%	S	<1	L-M	-	Vesicles are large (1-3mm) and filled with a soft,
29,38,74											white (zeolite) crystalline material.
8	Aphyric Basalt	1.7	A	-	-	1-2%	TR	1	M	-	Mn-coated. (~8mm) weathering rind notable.
6,14,21,31	"	0.6	A	-	-	1-2%	TR	TR	M	-	Small patches of Mn. (3-8mm) weathering rind prevalent.
40,54	Pg Phyric Basalt	1.6	A	-	5% Pg.	——		TR	L	-	Patches of Mn notable.
51,52,53	"	0.6	A	-	15-20% Pg.	——		TR	L	-	-
55,56	"	0.2	A	-	25-30% Pg.	——			L	-	Large (3mm) phenocrysts. Fracturing of rocks
											notable.
41,42,43, 44,45,46,	Ol + Pg Phyric Basalt	9.8	A	-	10-15%. (3-5%) Ol and (7-12%)	3-5%	-	TR	L-M	-	Phenocrysts are composed of small olivine crystals
47,48,49, 50					Pg.						and larger (2mm) Pg crystals. A few samples
											show large (4mm) vesicles and a faint weathering rind.
4,34	Aphyric Basalt	6.4	A	-	-	1%	T	5-10	M	-	Thick Mn-coating. Vesicles filled with zeolites (?).
2,3	Brecciated Basalt	0.1	A	-	-	——			H	-	Supported by a clay matrix.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE IO-11/76 STATION 60 DREDGE 11 DESCRIBED BY D. Bergersen/P. Andrew DATE 6/5/85

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
12	Erratic	0.2	M	Qtz. + Pg.	-	—		TR	L	-	Felsic-igneous (Aplite?).
4	Erratic	0.1	F	-	5% Pg.	—		-	L	-	Diabase?
14	Erratic	0.2	A	-	-	—		1	L	-	Greenstone?
	Unlabeled	∿42	kg of	small angular	talus fragments	(unlabeled).					
NOTE:	UNKNOWN SAMPLES	WERE	RE-LA	BELED CONSECUTI	VELY FROM 169 AND	UP.					

		STATION:	60	DREDGE:	12						DATE: 6/3/85
1	Aphyric Basalt	0.1	A	-	TR - Pg.	—			L	-	Thin weathering rind apparent. Rounded erratic.
2	"	0.4	A	-	"	2%	—		L	-	Vesicles somewhat lineated. Rounded erratic.
3	Basalt	0.1	A	-	1% Pg.	1%	—		L	-	Rounded erratic.
4	Metadiabase	0.1	A	-	12% - large (1-3mm) Pg.	20%	—		L	-	Rim exhibits large (1mm) vesicles with a pumice core noted.
6	Clay	0.25	A	-	"	—				-	-


KNORR 61
3-23 NOV., 1976
WOODS HOLE
UNITED STATES
BERMUDA
CUBA
CENTRAL AMERICA
SOUTH AMERICA
85°
80°
75°
70°
60°
65°
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********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
KNR	61	1	0005	0000	8	7611 5	39 46.1'N	66 17.4'W	9	115.96	0005	2900.	3900.	071K	12	0000	0	
KNR	61	1	0008	0000	8	7611 5	39 48.0'N	66 18.8'W	6	115.95	0008	2800.	2700.	2.6K	12	0000	0	
KNR	61	1	0009	0000	8	7611 7	38 28.3'N	63 10.5'W	9	115.83	0009	2000.	1850.	059K	12	0000	0	
KNR	61	1	0010	0000	8	7611 7	38 26.7'N	63 9.7'W	6	115.83	0010	2150.	2025.	0.5K	12	0000	0	
KNR	61	1	0013	0000	8	7611 8	38 26.8'N	63 9.5'W	6	115.83	0013	2375.	2350.	005K	12	0000	0	
KNR	61	1	0014	0000	8	7611 8	38 26.0'N	62 51.0'W	6	115.82	0014	3125.	2550.	072K	12	0000	0	
KNR	61	1	0015	0000	8	7611 8	38 26.3'N	62 50.5'W	9	115.82	0015	3300.	2400.	023K	12	0000	0	
KNR	61	1	0016	0000	8	7611 9	37 27.2'N	59 45.2'W	6	114.79	0016	2950.	2350.	005K	12	0000	0	
KNR	61	1	0017	0000	8	7611 9	37 26.0'N	59 45.4'W	6	114.79	0017	3000.	3050.	080K	12	0000	0	
KNR	61	1	0019	0000	8	761110	37 27.2'N	59 47.1'W	9	114.79	0019	2800.	2225.	031K	12	0000	0	
KNR	61	1	0022	0000	8	761111	35 18.5'N	57 30.5'W	6	114.57	0022	3200.	2250.	050K	12	0000	0	
KNR	61	1	0023	0000	8	761111	35 18.4'N	57 31.5'W	6	114.57	0023	2625.	2650.	017K	12	0000	0	
KNR	61	1	0024	0000	8	761112	35 18.2'N	57 32.3'W	9	114.57	0024	2725.	2125.	100K	12	0000	0	
KNR	61	1	0027	0000	8	761113	35 6.2'N	57 25.2'W	6	114.57	0027	3500.	2325.	030K	12	0000	0	
KNR	61	1	0028	0000	8	761113	35 5.7'N	57 25.2'W	9	114.57	0028	3200.	2550.	018K	12	0000	0	
KNR	61	1	0029	0000	8	761113	35 5.2'N	57 24.6'W	6	114.57	0029	3025.	2425.	025K	12	0000	0	
KNR	61	1	0031	0000	8	761114	36 18.8'N	58 18.0'W	9	114.68	0031	3125.	1900.	110K	12	0000	0	
KNR	61	1	0032	0000	8	761114	36 18.7'N	58 18.0'W	6	114.68	0032	3150.	2625.	008K	12	0000	0	
KNR	61	1	0033	0000	8	761114	36 19.6'N	58 18.5'W	6	114.68	0033	2975.	2475.	045K	12	0000	0	
KNR	61	1	0034	0000	8	761116	39 2.7'N	60 55.6'W	9	115.90	0034	2650.	2475.	002K	12	0000	0	
KNR	61	1	0037	0000	8	761116	38 53.8'N	60 57.8'W	6	115.80	0037	2100.	1850.	034K	12	0000	0	
KNR	61	1	0038	0000	8	761117	38 54.6'N	60 59.2'W	9	115.80	0038	1575.	1100.	040K	12	0000	0	
KNR	61	1	0039	0000	8	761117	38 55.3'N	60 58.6'W	6	115.80	0039	1450.	1125.	025K	12	0000	0	
KNR	61	1	0042	0000	8	761118	38 34.6'N	60 6.0'W	6	115.80	0042	3075.	2800.	020K	12	0000	0	
KNR	61	1	0043	0000	8	761118	38 34.2'N	60 10.8'W	6	115.80	0043	2700.	2275.	3.4K	12	0000	0	
KNR	61	1	0044	0000	8	761118	38 18.4'N	62 56.0'W	9	115.82	0044	3925.	3150.	050K	12	0000	0	
KNR	61	1	0045	0000	8	761119	38 18.0'N	62 56.4'W	6	115.82	0045	3700.	2575.	055K	12	0000	0	
KNR	61	1	0046	0000	8	761120	39 46.2'N	66 16.5'W	6	115.96	0046	3275.	2750.	7.4K	12	0000	0	
KNR	61	1	0047	0000	8	761122	39 47.2'N	66 16.8'W	9	115.96	0047	2725.	3000.	070K	12	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 2 DREDGE 2 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/5/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Garnet Gneiss	1.5	M	-	Garnet				L	-	Erratic.
2	Bag of Sediment	-	-	-	-				-	-	With forams.
		STATION:		3	DREDGE: 3						DATE: 11/7/76
1	Gabbro	1.0	C	-	-			TR	L	Altered edges.	Worm tubes on exterior.
2	Manganese Nodules	1.0	-	-	-			X	-	-	4 round nodules.
3	Basalt	5.0	F	-	Pg - 3%.			TR	L	Porphyritic.	Worm tubes on exterior. Spots of Mn, 1mm.
4	Felsic-Igneous	1.0	C	-	-			TR	L	-	Erratic. Very angular. Spots of Mn (< 1 mm).
(5 - 9)	Manganese Nodules	4.1 tot.	-	-	-			X	-	-	Numerous nodules ~1 Kg.
10	Manganese Crust	0.7	-	-	-			30	-	-	Chunks of Mn crust.
11	Erratic	3.2	M	-	Quartz, garnet.			TR	L	-	Quartz-garnet gneiss?
12	Manganese Crust	0.8	-	-	-			20	-	-	5 samples total. Chunks of Mn crust.
13	Manganese Nodule	1.0	-	-	-			X	-	-	-
14	Manganese Crust	0.8	-	-	-			TR	-	-	Pieces of Mn crust.
15	Coral	2.0	-	-	-			TR	-	-	Large lithified coral.
16	Mn Crust	2.3	-	-	-			50	-	-	Pieces of Mn crust.
17	Calcareous Sandstone	2.5	C	-	-			1	L	-	With shell fragments.
18	Mn Crust	3.0	-	-	-			50	-	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 3 DREDGE 3 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/7/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
19	Gneiss(?)	0.7	M	-	Quartz.			TR	L	-	Quartzitic(?) bands.
(20 - 22)	Mn Crust	>35 tot.	-	-	-			70	-	-	Large pieces of crust ∿>12kg. 3 samples total.
24	Coral	-	-	-	-					-	Starfish, and sponges (in bag).
25	Sponge	-	-	-	-					-	-
26	Horn Coral	-	-	-	-					-	4 pieces total.
27	Mn Crust	-	-	-	-			50	-	-	Crust coating corals, sponge, and worm tube.
28	Coral	-	-	-	-					-	Branching and spiral coral.
23	Feldspar Gneiss	>12	C	Interstitial quartz.	Garnet porphyroblasts.			TR	L	-	Attached biological concretions.
		STATION:		4	DREDGE: 4						
1	Lithified Sediment	0.5	-	-	-			10	-	-	Worm burrows noted. Coated with Mn-Fe crust.
		STATION:		5	DREDGE: 5						
1	Glacial Erratic	0.8	F	-	-			TR	L	-	Mn staining on "paleo-up" side.
2	"	1.0	M	-	-			TR	L	-	"
3	"	0.7	C	-	-			TR	L	-	"
4	"	2.0	M	-	-			TR	L	-	"
5	Tuff Breccia	0.5	C	-	-			1-2	L	Clasts exhibit concentric weathering rinds.	Clast measuring up to 1 1/2 cm.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 6 DREDGE 6 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/8/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	3.0	M	-	Pg - 2%.	TR	-	10-20	L	Porphyritic.	-
2	"	2.5	M	-	TR - Pg, 10% weathered grains.	TR	-	TR	M	"	Weathered (rusty) phenocrysts.
(3 - 7)	Mn Nodules	~20 tot.	-	-	-	——		X	-	-	Large cobble-size nodules. 5 samples total.
8	Basalt	2.2	M	-	3% Pg, 5% rusty grains.	TR	-	10-40	M	Altered edges.	Carbonate veining. Mn coating and infilling.
9	Glacial Erratic	2.7	-	-	-	——		TR	-	-	Mn-stained.
10	Mn Nodules and Crusts	>12	-	-	-	——		X	-	-	Cobble to boulder size.
11	Basalt	1.2	M	-	25% Pg. Some very weathered.	TR	-	TR	M	Altered.	-
12	Felsic Erratic	1.0		-	-	——		TR	L	-	Glacial.
13	Mn Nodules and Crusts	12.0	-	-	-	——		X	-	-	-
14	Basalt	1.7	F	-	15% Weathered Pg.	——		TR	M	Weathering rind apparent.	Porphyritic.
15	"	0.6	F	-	"	——		TR	M	Altered	"
16	Mn Nodule	9.0	-	-	-	——		X	-	White alteration, carbonate?	Large boulder.
17	Mn Nodules	1.0	-	-	-	——		X	-	-	Several nodules.
18	Basalt	0.6	F	-	20% weathered Pg.	——		TR	M	Altered.	Porphyritic.
19	Erratic	0.5	F	-	-	——		TR	L	-	Glacial. Rounded basalt?
20	Basalt	0.7	F	-	30% weathered Pg.	——		TR	M	-	Very porphyritic.
21	Basalt	0.4	M	-	50% weathered Pg.	——		——	L	Altered.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 7 DREDGE 7 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/8/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Mn Nodules	1.5	-	-	-	-	-	X	-	-	-
2	Sediment	0.5	-	-	-	-	-	TR-30	-	-	3 pieces of calcareous sediment with Mn-coating.
(3 - 5)	Lithified sediment fragments	∿10 tot.	-	-	-	-	-	TR-30	-	-	3 samples total. Sediment coated with Mn-crust.
6	Glacial Erratic	0.5	-	-	-	-	-	-	L	-	-
7	Felsic Erratic	1.0	C	Feldspar?	-	-	-	-	L	-	Glacial.
8	Basalt	1.5	F	-	20% large embayed Pg.	TR	-	-	M	-	-
9	Glacial Erratic	1.0	M	Felsic groundmass.	Garnet porphyroblasts.	-	-	-	L	-	-
10	Basalt	0.2	M	-	Hornblende? 30% weathered Pg.	TR	-	TR	M	-	Vesicles filled. Feldspars highly altered.
11	Basalt	1.0	M	-	-	-	-	-	L	Fresh center with alteration rim.	-
12	Basalt	0.2	F	-	15% highly altered Pg.	2%	-	-	M	Moderate alteration noted.	-
13	Claystone	0.4	-	-	-	-	-	-	-	-	-
(14 - 15)	Glacial Erratic	3.2 tot.	F	Felsic.	Garnet porphyroblasts.	-	-	TR	L	-	3 gneissic rocks weighing ∿2 kg each.
16	Basalt	0.2	M	-	20% - highly altered Pg.	10%	-	-	M	Moderate alteration noted.	-
17(?)	Rhyolite(?)	0.2	M	-	-	-	-	-	L	-	Pink feldspar and quartz noted.
18	Glacial Erratic	1.0	-	-	-	-	-	-	L	-	Metamorphic?
(19 - 20)	"	6.0 tot.	-	-	-	-	-	-	L	-	2 samples total.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 7 DREDGE 7 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/8/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
21	Basalt	0.5	VF	-	-	—	—	—	L	-	Very fresh, rounded.
22	"	0.2	F	-	-	—	—	—	L	wide alteration rim.	Fresh core.
23	Shale	0.5	F	-	-	—	—	—	L	-	Weathered on all sides.
24	Granite	4.0	C	-	-	—	—	TR	L	-	Glacial erratic.
(25 - 26)	Glacial Erratics	0.9 tot.	-	-	-	—	—	—	L	-	2 samples total.
27	Quartzite	0.5	F	-	-	—	—	2-3	-	-	Fe-Mn coating notable. Flat slab shape.
28	Mudstone(?)	0.5	A	-	-	—	—	—	L	Infilled cracks.	Burrows noted?
29	Conglomerate	-	M	-	-	—	—	—	L	Tightly cemented. SiO_2 cement?	Cemented clasts. Clasts are rounded.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 8 DREDGE 8 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/9/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Granite	0.5	C	-	-	—	—	TR	L	-	Glacial erratic.
(2 - 7)	Mn Crust	3.1 tot.	-	-	-	—	—	X	-	-	6 samples total. Crust adhering to brecciated basalt.
8	Lapilli Tuff	0.6	M	-	-	—	—	X	H	-	Brecciated.
9	Mn Crust	0.2	-	-	-	—	—	X	-	-	Adhering to basalt breccia.
10	Quartzite	0.2	F	-	-	—	—	TR	L	-	2 pieces. Glacial erratic.
11	Mn Crust	-	-	-	-	—	—	X	-	-	Adhering to basalt breccia.
12(?)	Vesicular Basalt	0.5	A	-	-	50%	-	TR	M	Moderately altered.	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 9 DREDGE 9 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/9/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Glacial erratic	4.3	F	-	-	——		TR	L	-	Gneissic texture.
(2 - 3)	Mn Crust	5.2 tot.	-	-	-	——		X	-	-	2 samples total. Adhering to basalt breccia and calcareous sediment.
4	Vesicular Basalt	0.6	A	-	-	50%	-	TR	H	-	Vesicles - mud filled. 8 pieces total.
5	Mn-encrusted Basalt	0.5	-	-	-	——		4-5	H	-	Vesicular basalt encrusted with Fe-Mn. Also, 2 pieces of Mn-coated calc. sediment.
6	Basaltic Sandstone	8.0	F	-	-	——		TR-10	H	-	Friable.
7	Breccia	>12	C	-	-	——		3	H	-	Calcareous - basaltic lithic breccia. (4 pieces total.)
8	Mn Crust	1.5	-	-	-	——		X	-	-	4 pieces.
9	Basaltic Sandstone	0.1	F	-	-	——		TR	VH	-	Nearly rotted to all clay.
10	Mn Crust	0.2	-	-	-	——		X	-	-	Crust with attached lithic calcareous sediment.
11	Glacial Erratic	1.6	C	-	-	——		TR	L	-	Granitic composition.
12	Vesicular Basalt	1.0	A	-	-	50%	-	<5	H	-	Very vesicular with attached coral holdfasts.
13	Mass of Sponge Spicules	-	-	-	-	——		——	-	-	-
14	Glacial Erratic	2.0	C	-	-	——		TR	L	-	Felsic.
15	Mn Crust	1.5	-	-	-	——		X	-	-	5 pieces total.
16	Sediment	0.2	-	-	-	——		2	-	-	Lithified calcareous sediment.
17	Quartzite	-	F	-	-	——		——	L	-	Glacial erratic.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 9 DREDGE 9 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/9/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(18 - 19)	Breccia	3.0 tot.	C	-	Vesicular basalt clasts.	20%	-	10-20	H	-	Thick Mn oxides encrusting basaltic breccia. (3 pieces total.)
20	Sediment	1.0	-	Sponge and coral holdfasts.	-	-	-	10-20	-	-	Thick Mn oxides encrusting calcareous sediment with burrows.
(21 - 22)	Vesicular Basalt	>12 tot.	A	-	-	20%	-	TR-20	VH	Highly altered, disaggregating	2 samples composed of 8 separate pieces.
(23 - 24)	"	>14 tot.	A	-	-	30%	-	10	VH	"	Encrusted with layered Mn. (2 samples total.)
25	Sediment	0.2	-	-	-	-	-	X	-	-	Mn oxides encrusting calcareous sediment.
26	Vesicular Basalt	>12	A	-	-	30%	-	10	VH	Highly altered, disaggregating	Very thick encrusting Mn oxides.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 11 DREDGE 11 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/9/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Granite	1.0	C	-	-	——		TR	L	-	Glacial Erratic.
2	Basalt	0.2	-	-	-	10%	TR	5	H	Highly altered, clayey.	-
3	Vesicular Basalt	0.2	-	-	Calcite amygdules.	X	X	TR	VH	"	-
4	Highly Altered Basalt	0.4	-	-	-	-	TR	2	VH	"	Calcite amygdules.
5	Lithified Sediment	0.2	-	-	-	——		2	-	-	Fe-Mn oxides encrusting lithic calc. sediment.
(6 - 7)	Highly Altered Basalt	1.6 tot.	F	Oolitic-like vesicles filled with $CaCO_3$.		-	A	10	VH	Highly altered, clayey.	Notable Mn-Fe oxides. (2 samples composed of 8 pieces.)
8	Lithified Calcareous Sediment	0.7	-	-	-	——		10	-	-	Thick Mn oxides and coral holdfasts noted.
9	Mn Crust	0.5	-	-	-	——		X	-	-	-
10	Sediment	0.2	-	-	-	——		X	-	-	Mn oxides encrusting lithified calcareous sediment. Burrowing.
11	Sediment	1.3	-	-	-	——		10	-	-	Highly burrowed sediment encrusted with Fe/Mn-oxide. (3 pieces).
12	Highly Altered Basalt	1.0	-	-	Calcite amygdules.	TR	S	TR	VH	Clayey, highly altered.	With calcareous sediment infilling cavity.
(13 - 14)	"	9.3 tot.	-	-	-	——		TR	VH	"	2 samples composed of 4 pieces.
15	"	1.5	-	-	Calcite amygdules.	TR	TR	10	VH	"	Encrusted with Mn oxides with some coral stems noted
16	Coral	0.2	-	-	-	——		TR	-	-	Coral partially encrusted with Mn oxides.
17	Highly Altered Basalt	15	-	-	Calcite amygdules.	TR	S	10	VH	Clayey, highly altered.	Encrusted with Mn oxides. (5 pieces - once the same sample.)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 12 DREDGE 12 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/11/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	>12	A	-	Px, Hb?	—	—	TR	M	-	-
2	Lithified calcareous sediment	1.0	-	-	-	—	—	5	-	-	Mn stained worm burrows.
3	Basalt	0.4	-	-	-	TR	-	10	VH	Highly altered, clayey.	Nearly complete Mn-encrustation.
(4 - 5)	Lithified calcareous ooze	1.8 tot.	-	-	-	—	—	1-2	-	-	2 samples total. Noted Mn-encrustation and worm burrowing.
6	Breccia	1.2	C	-	-	—	—	30	VH	Highly altered, clayey.	Lithified carbonated clasts coated with thick Mn-crust.
7	Mn Crust	0.6	-	-	-	—	—	30	H	Highly altered nucleation core.	Concreting on brecciated sediment.
(8 - 10)	Lithified calcareous sediment	5.5 tot.	-	-	-	—	—	1-2	-	-	With Mn-coated worm burrows. (3 samples total.)
11	Calcareous ooze	0.5	-	-	-	—	—	—	—	-	Lithified.
12	Volcanic Breccia	0.7	-	-	-	—	—	—	H	Highly altered.	Friable-fragmented sediment.
(13 - 14)	Basalt	1.8 tot.	A		Crystalline amygdules.	TR	A	TR	M	Moderately altered.	2 samples total. Finely vesicular.
(15 - 17)	Lithified Sediment	4.5 tot.	-	-	-	—	—	1-2	-	-	3 samples total. (10 pieces) Burrowed calc. sediment.
18	"	4.4	-	-	-	—	—	3-4	-	-	Burrowed calc. sediment.
19	Mn Crust	2.7	-	-	-	—	—	X	-	-	7 pieces.
(20 - 21)	Lithified Sediment	2.0 tot.	-	-	-	—	—	3-4	-	-	2 samples total (12 pieces). Burrowed calc. sediment.
22	Basalt	0.6	A	-	-	5%	TR	20	H	Highly altered, clayey.	2 pieces.
(23 - 24)	"	3.5 tot.	A	-	-	2%	TR	3-4	VH	"	2 samples composed of 5 pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 12 DREDGE 12 DESCRIBED BY Houghton/Sulanowski/Adrew DATE 11/11/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
25	Mn - crust	0.1	-	-	-	——		1-2	-	-	2 pieces of lithified ooze form nucleation sites.
26	Breccia	0.5	M	White non-carbonate cement (zeolites?).	-	——		TR	H	Highly altered (rusty) clasts.	2 pieces total.
27	Basalt	5.0	A	-	Px - crystals.	10%	-	TR	H	Clayey.	Finely phorphyritic.
		STATION:		13	DREDGE: 13						
(1 - 2)	Breccia	>18 tot.	M	Calcite cement noted.	-	——		3-4	M	-	2 samples total (17 pieces) Volcaniclastic with moderately altered lapilli clasts.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 14 DREDGE 14 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/12/76

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	>12	F	-	5% pyroxene (fresh).	5%	-	TR	L	-	Vesicular. Large pyroxene phenocrysts.
2	Mn crust	>12	-	-	-	——		X	-	-	Large, thick, boulder size fragment.
(3 - 4)	Basalt	1.4 tot.	A	-	Secondary biotite. Px.	——		TR	VH	Clayey alteration.	2 samples total. One with Mn-veins, the other with clastic dike.
5	Basalt	1.0	A	-	-	5%	TR	1-2	M	-	Finely vesicular, cobble-sized fragment. Calc-ooze/Mn coating.
6	Lithified calc. ooze	1.1	-	-	-	——		TR	-	-	Pitted. Mn-crust.
7	Basalt	2.0	A	-	Secondary biotite. Px.	——		1-3	VH	Clayey, extremely altered.	Well developed Mn-crust with coral holdfasts.
8	Lithified sediment	0.2	-	-	-	——			-	-	Lithified calcareous mud.
9	Coral	0.1	-	-	-	——		1	-	-	Coral stem with Mn-crust.
10	Mn Crust	7.0	-	-	-	——		X	-	-	16 pieces.
(11 - 12)	Lithified calcareous ooze	5.5 tot.	-	-	A few clasts of vesicular basalt.	——		TR-20	-	-	2 samples total. With Mn-crust and lapilli clasts.
(13 - 15)	Basalt	5.2 tot.	A	-	Px.	——		TR	VH	Highly altered, clayey.	3 samples total. Secondary infilling - zeolites?
16	Mn Crust	12	-	-	-	——		X	-	-	-
(17 - 24)	Basalt	11 tot.	A	-	Px.	——		TR	VH	Extremely altered.	8 samples total. Composed of ∿20 pieces.
(25 - 28)	Lithified calcareous ooze	3.9 tot.	-	-	-	——		TR-20	-	-	4 samples (∿7 samples). With rock inclusions and Mn crust.
29	Basalt	3.0	A	-	Pyroxene.	——		1-2	M	Moderately altered.	Thin Mn crust.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 14 DREDGE 14 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/12/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(30 - 31)	Mn Crust	>23	-	-	-	—	—	X	-	-	2 samples total. One with well preserved coral.
32	Coral	-	-	-	-	—	—	1-2	-	-	Mn coating noted.
33	Sponge	-	-	-	-	—	—	1-2	-		Encircling Fe-Mn coated coral fragment.
		STATION:	15	DREDGE: 15							
(1 - 3)	Mn Crust	4.3 tot.	-	-	-	—	—	X	-	-	3 samples composed of ~8 pieces. Coral holdfasts noted.
4	Breccia	0.5	F	-	-	—	—	3-4	VH	Highly altered, friable.	Volcaniclastic breccia with Mn-encrustation.
5	Brecciated calc. sediment	0.7	-	-	-	—	—	40	-	-	Mn encrusted. Sediment greenish in color.
6	Basalt	0.4	A	-	Zeolitic amygdules.	5%	S	10	VH	Highly altered.	Amygdaloidal basalt with Mn-crust.
7	Sandstone	2.0	F	-	-	—	—	3-4	H	-	Volcaniclastic, encrusted with Mn.
8	Breccia	1.2	C	-	-	—	—	10	H	-	Mn crusting. Green calcareous sediment and vesicular basalt clasts.
9	Sandstone	0.1	F	Calcareous cement.	-	—	—	2	-	-	Mn stained burrows, "glassy looking" phosphorite.
10	Sediment	.05	-	-	-	—	—	—	—	-	Green calcareous sediment.
11	Lithified calcareous ooze	2.3	-	-	-	—	—	2-4	-	-	Encrusted with Fe-Mn oxide Burrows noted.
12	Basalt	0.4	A	-	Calcite amygdules. TR - Px.	-	A	-	H	Highly altered.	Amygdaloidal with calcite infilling.
13	Basalt	0.4	A	-	TR-Px. zeolitic amygdules.	5%	S	10	H	Highly altered, clayey.	Mn crusting noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 15 DREDGE 15 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/12/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
14	Breccia	0.5	C	-	-	——		10	H	-	Lithic green calc. sediment and vesicular basalt clasts with Mn-crust.
15	Breccia	0.2	C	$CaCO_3$ cement.	Weathered basalt clasts.	——		TR	M	-	Volcaniclastic.
16	Basalt	0.6	A	-	-	TR	TR	-	VH	Highly altered, friable.	Highly veined. Appears brecciated.
(17 - 22)	Basalt	>20 tot.	A	Zeolitic amygdules.	Px - TR.	5 - 15%	S	3-4	VH	Moderate to highly altered.	6 samples total. Vesicular, with Mn-crust.
		STATION:		16	DREDGE: 16						
1	Breccia	7.0	C	-	-	——		TR	L	-	Carbonate breccia with basalt clasts.
2	Lithified calcareous ooze	2.2	-	-	-	——		TR-10	-	-	Mn crusting of worm burrows noted.
3	Breccia	0.5	C	Carbonate cement.	Weathered basalt clasts.	——		5	H	-	Volcaniclastic with Fe-Mn crusts.
(4 - 6)	Basalt	7.5 tot.	A	-	Zeolitic amygdules.	25%	S	TR	H	Highly altered.	3 smples (5 pieces total). Vesicular. Sample No. 6 is brecciated.
		STATION:		17	DREDGE: 17						
1	Mn crust	>12	-	-	-	——		X	-	-	Several pieces. Coral fragments noted.
2	"	0.4	-	-	-	——		X	-	-	Mn-crusting on basalt? With attached coral.
3	Basalt	1.3	A	-	Calcite amygdules.	TR	A	20	VH	Highly altered, friable.	Amygdaloidal basalt with Mn-encrustation. (3 pieces)
4	Breccia	>12	-	-	-	——		4	-		Volcanic breccia with Mn-encrustation.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 18 DREDGE 18 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/14/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	>22	A	-	-	——		10	VH	Heavily altered, friable.	Coral holdfasts noted.
2	Coral	0.5	-	-	-	——		1-2	-	-	Mn crust noted.
3	Gray claystone	>12	A	-	-	——		TR	-	-	-
(4 - 5)	Lithified calcareous ooze	>16	-	-	-	——		1-2	-	-	Mn crust noted — infilling burrows. 2 samples total.
6	Gray claystone	>12	A	-	-	——		2	-	-	Slightly silty.
7	Micaceous sandstone	0.5	F	-	Mica=biotite.	——		-	-	-	-
(8 - 9)	Sediment	3.6 tot.	-	-	-	——		TR-40	-	-	2 samples total. (10 pieces Mn crust noted. Calcareous sediment.
(10 - 16)	Basalt	10 tot.	A	-	Calcareous amygdules.	>10%	C	TR	VH	Highly altered, clayey.	7 samples total. (32 pieces).
17	Calc. Ooze	0.1	-	-	-	——		1-2	-	-	Mn-encrustation and worm burrows.
18	Breccia	0.1	M	-	-	——			H	-	Volcaniclastic with highly weathered clasts, friable.
19	Basalt	0.9	-	-	Zeolitic amygdules.	10%	C	TR	M	-	Vesicular basalt with dendritic Mn.
(20 - 21)	Bedded Claystone	3.6 tot.	-	-	-	——		TR-10	-	-	2 samples total. Slightly silty. Notable Mn and biotite.
22	Sediment	0.1	-	-	-	——		TR	-	-	Mn crust noted on calcareous sediment.
23	Basalt	2.5	A	-	-	——		TR	VH	Highly altered, friable.	Remnant Fe-Mn encrustation and abundant included calc. ooze.
24	Basalt	7.0	A	-	Zeolitic amygdules.	5%	S	TR	H	Highly altered, clayey.	Large vesicles. (6 pieces)

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 18 DREDGE 18 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/14/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
25	Mn Crust	0.5	-	-	-	—		X	-	Spicule mats noted.	Lithified calc. sediment forms nucleation sites.
											Burrowed.
26	Mn Crust	0.6	-	-	-	—		X	-	-	
27	Claystone	0.1	A	-	-	—		1-2	-	-	Slightly silty. Fe-Mn crust noted.
28	Lithified calc. ooze	4.0	-	-	-	—		TR	-	-	Mn-stained burrows. (2 pieces)
29	Basalt	1.5	A	-	Px - TR. (F - grained).	15%	S	TR-5	H	Highly altered.	Vesicular basalt. Zeolitic amygdules and veins.
30	Banded Gneiss	0.2	M	-	-	—		TR	L	-	Biotite bands in quartz and feldspar matrix.
31	"	1.0	M	-	-	—		TR	L	-	"
32	Basalt	5.0	F	-	Zeolitic amygdules.	TR	TR	5	M	-	-
33	"	0.5	A	-	"	TR	A	TR	H	Highly altered.	Notably amygdaloidal.
34	"	1.0	A	-	20% Px. (M - grained).	-	S	TR	H	-	Zeolitic amygdules.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 19 DREDGE 19 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/14/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	2.6	A	-	Zeolitic amygdules.	TR	C	TR	H	Highly discolored.	Amygdaloidal basalt. (5 pieces).
2	Basalt (?)	0.4	F	-	-	—	—	2	VH	Very highly altered, friable, clayey.	Mn crust notable, coating all sides.
3	Lithified calc. ooze	6.0	-	-	-	—	—	TR-2	-	-	6 pieces. Friable.
4	Gray claystone	.05	A	-	-	—	—	—	—	-	Friable.
		STATION:		20	DREDGE: 20						
1	Coral	>12	-	-	-	—	—	TR	-	-	Fe-Mn stained.
2	Lithified calc. ooze	12	-	-	-	—	—	TR	-	-	Burrows noted.
3	Calcareous gray claystone	7.0	A	-	-	—	—	TR	-	-	Rounded; white calcareous infilled burrows.
4	Sponge	-	-	-	-	—	—	TR	-	-	-
(5 - 6)	Lithified calc. ooze	18.2 tot.	-	-	-	—	—	TR 2	-	-	2 samples total. Burrows and Fe-Mn crust noted.
7	Breccia	5.0	C	-	-	—	—	5	VH	-	Phosphorite crust noted. Volcaniclastic. Friable.
8	Mn Crust	-	-	-	-	—	—	X	-	-	Large botryoidal fragments.
9	Lithified calc. ooze	4.0	-	-	-	—	—	1-2	-	-	Mn crust notable. Burrows.
10	Basalt	1.3	A	-	-	10%	TR	5	H	Highly altered.	Vesicular basalt.
11	Breccia	0.2	F	-	-	—	—	5	M	-	Volcanic breccia. (2 piece

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 21 DREDGE 21 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/14/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Breccia	2.0	M	-	Weathered basalt clast.	—	—	TR-10	M	-	Fossiliferous. Volcaniclastic - lithic carbonate breccia.
		STATION:		23	DREDGE: 23						
1	Limestone	2.0	A	-	-	—	—	—	—	Very hard, compact.	Radiolarian rich. (4 pieces)
2	Claystone	1.1	A	-	-	—	—	—	—	-	With volcanic clasts in carbonate rich matrix.
3	Lithified calc. ooze	7.0	-	-	-	—	—	TR	-	Lithic.	Mn crusted worm burrows.
(4 - 13)	Basalt	6.0 tot.	A	-	Zeolitic amygdules, Px - 8%.	TR 12%	S	-	H	Highly altered.	10 samples total. Vesicular basalt.
14	Limestone	0.1	A	-	-	—	—	—	—	Very hard, compact.	Enclosing volcaniclastic breccia.
(15 - 16)	Basalt	5.2	A	-	Calcite amygdules, Px - 5%.	TR	C	-	M	Moderately altered.	2 samples total. Calc. ooze inclusions.
(17 - 18)	"	7.0 tot.	F	-	Zeolitic and calcite amygdules. Px - 10%.	TR	A	-	H	Highly altered.	2 samples total. Veins of calc. sediment.
19	Basalt	2.0	A	-	Calcite amygdules. 2% - Px.	TR	A	-	H	Moderately altered.	-
(20 - 21)	"	2.0	F	-	Calcite and zeolitic amygdules. Px - 10%	25%	A	TR	H	-	2 samples total. Vesicular.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 24 DREDGE 24 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/17/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Lithified calc. ooze	>12	-	-	-			1-2	-	-	(~13 pieces) With Mn-crusted worm burrows.
2	Mn Crust	1.6	-	-	-			X	-	-	3 pieces.
3	Coral	0.6	-	-	-			TR	-	-	Mn-crust noted.
4	Coral	0.1	-	-	-					-	-
5	Basalt Breccia	0.1	C	-	Highly weathered basalt clasts.			TR	H	-	Clastic basalt in carbonate sediment.
6	Breccia	5.0	C	Calcareous matrix cement.	Some Px in clasts.			TR	H	-	Volcaniclastic. Coarse, highly weathered, basalt clasts.
(7 - 8)	Basalt	3.9 tot.	A	-	5% weathered grains, 10%-Px.			TR	M	Moderately altered, with calcite veins.	Attached lithified calc. ooze.
(9 - 10)	Basalt	2.3 tot.	A	-	25% - Px, 2% weathered grains.			TR	M	Moderately altered, with calcite veins.	-
11	Glacial Erratic	0.5	F	-	-				L	-	Igneous. Mafic character.
12	Mn crust	>12	-	-	-			X	-	-	Thick (10cm), layered crust.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 25 DREDGE 25 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/17/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Coral	4.0	-	-	-			2-4	-	-	Mn-crust noted.
2	"	1.0	-	-	-					-	-
(3 - 4)	Mn crust	>15 tot.	-	-	-			X	-	-	2 samples total. Coating calcareous sediment.
5	Lithified calc. sediment	0.7	-	-	-					-	-
(6 - 8)	Basalt	5.5 tot.	-	-	Px.			2-4	H	Highly altered basalt clasts.	3 samples total. Notable Fe-Mn crust.
		STATION:	26	DREDGE:	26						
1	Semi-lithified calc. ooze	>12	-	-	-					-	Clean, white sediment.
2	Brittle Star	-	-	-	-					-	-
3	Glacial Erratic	1.0	C	-	-				L	-	Granitic.
5	Limestone	1.0	A	-	-			TR	L	-	-
6	Glacial Erratic	0.2	F	-	-			TR	L	-	Basalt?
7	Biotite Schist	0.5	M	-	-				L	-	Glacial erratic.
8	Glacial Erratic	0.5	F	-	-			TR	L	-	Felsic character.
9	Phyllite	0.5	M	-	-				L	-	Glacial erratic.
10	Glacial Erratic	0.5	M	-	-			TR	L	-	Granitic character.
11	"	0.4	C	-	-			TR	L	-	-
12	"	0.6	F	-	-			TR	-	-	Basalt?

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 26 DREDGE 26 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/18/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
13	Glacial Erratic	2.0	M	-	-			TR	L	-	Felsic gneiss?
14	Quartzite	0.4	A	-	-			TR	L	-	Glacial erratic.
(15 - 16)	Fossiliferous limestone	0.5	F	-	-			TR	L	-	Mollusks noted in No. 16. Sample No. 15 is dolomitic.
17	Glacial erratic	0.2	F	-	-				L	-	Felsic, banded.
18	Erratic	-	A	-	-			TR	L	-	2 pieces of rounded basalt.
		STATION: 27			DREDGE: 27						
(1 - 2)	Mafic-Glacial Erratics	4.0	F	-	-			TR	L	-	2 samples consisting of 4 pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 28 DREDGE 28 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/18/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 3)	Mn Crust	17 tot.	-	-	-	—		X	-	-	3 samples composed of ~20 pieces. Thick (10cm) massive crust.
4	Mn Nodules	2.7	-	-	-	—		X	-	-	4 pieces. (8cm in dia.)
5	Limestone	1.1	A	-	-	—		1-2	-	-	Mn-crust noted. (2 pieces)
6	Mn Crust	1.0	-	-	-	—				-	Coating calc. sediment.
7	Feldspathic Gneiss	1.0	M	-	-	—			L	-	Glacial erratic.
8	Glacial Erratic	1.3	F	-	-	—		TR	L	-	Pelitic schist.
9	"	1.0	M	-	-	—		TR	L	-	Feldspathic gneiss.
10	"	1.2	F	-	-	—		TR	L	-	Pelitic schist.
11	Mn Crust	1.0	-	-	-	—		X	-	-	-
12	Basalt Breccia	4.0	C	Fine grained basalt and carbonate.	Cobble-sized weathered basalt clasts.	10%-TR	S	-	M	-	Cobble-sized conglomeration. Px noted throughout.
13	Basalt	1.0	F	-	Zeolitic amygdules.	1%	S	TR	M	Moderately altered.	-
14	"	2.0	F	-	3% - Px.	TR	A	-	M	Moderately fresh.	Calcite amygdules.
15	Augen Gneiss	1.0	F	-	-	—		3	L	-	Finely laminated. Glacial erratic.
16	Basalt	0.5	A	-	-	TR	A	-	M	-	Calcite amygules.
17	Mn Crust	>12	-	-	-	—		X	-	-	-

WHOI ROCK SAMPLE DESCRIPTION

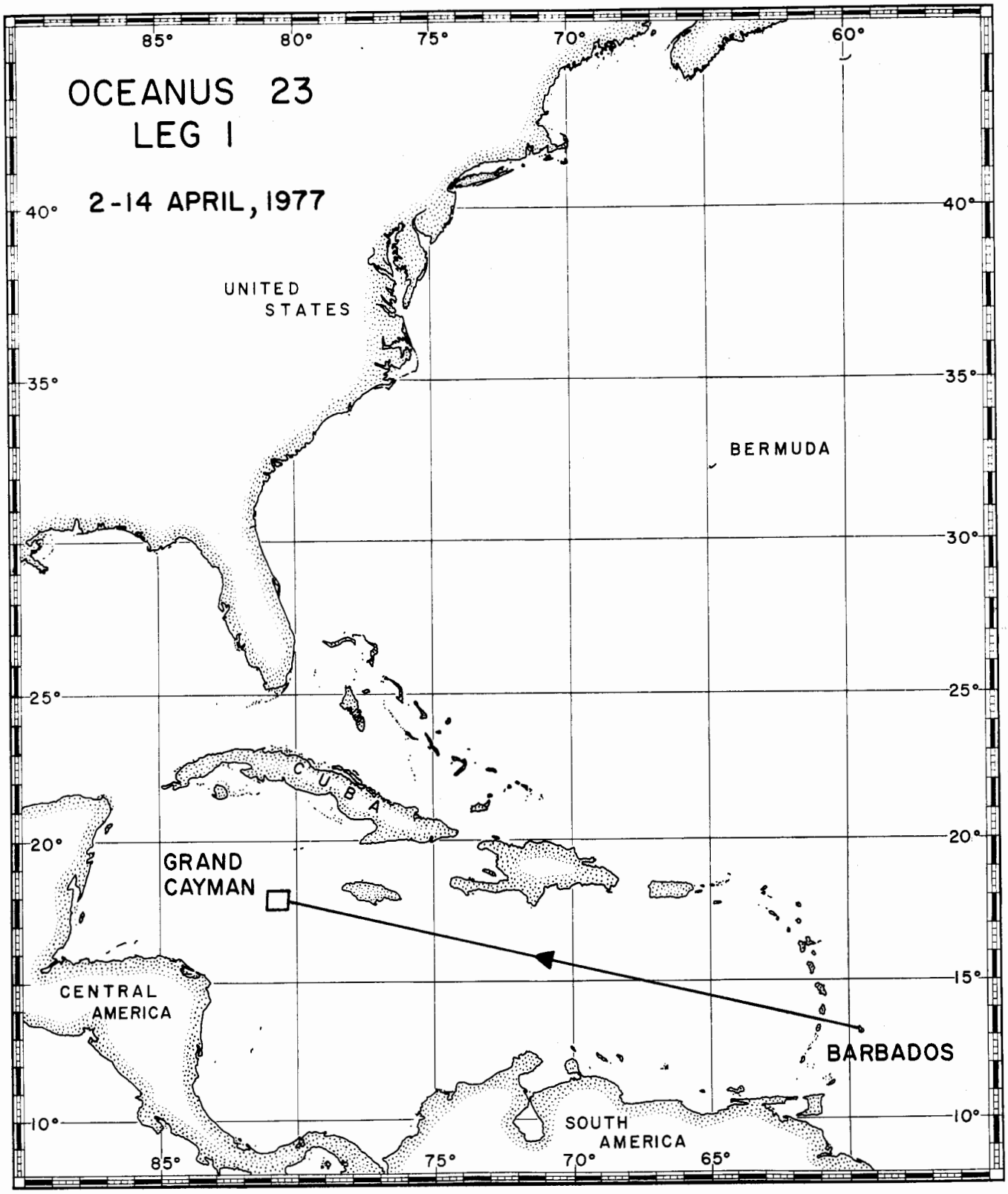
CRUISE KNR 61 STATION 29 DREDGE 29 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/19/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Mn Nodules	>12	-	-	-	—	—	X	-	-	46 round pieces. (5-8 cm in dia.)
2	Mn Crust	>12	-	-	-	—	—	X	-	-	44 pieces.
3	Glacial Erratics	1.0	F-M	-	-	—	—	TR	L	-	Variable grain sizes, felsic. (3 pieces)
4	"	>12	F	-	-	—	—	TR	L	-	2 pieces. (Quartzite and anorthosite?)
5	Basalt	1.0	A	-	Zeolitic amygdules.	8%	S	-	H	Clayey.	-
6	Mn Crust	4.5	-	-	-	—	—	50	-	-	Coating calc. sediment.
7	Mn-cemented Mn nodules	10	-	-	-	—	—	80	-	-	Several cemented nodules. (8cm in dia.) (5 pieces).
		STATION:		30	DREDGE: 30						DATE: 11/20/76
1	Mn Nodules	7.0	-	-	-	—	—	X	-	-	4 pieces.
2	Glacial Erratic	1.0	C	-	-	—	—	—	L	-	Granitic character.
3	Basalt	0.1	-	-	Calcite amygdules.	TR	TR	-	M	Moderately altered.	2% Px phenocrysts.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE KNR 61 STATION 31 DREDGE 31 DESCRIBED BY Houghton/Sulanowski/Andrew DATE 11/21/76

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1 - 2)	Erratics	45 tot.	A-C	-	-				L	-	2 samples, composed of ∿60 pieces (mostly felsic).
3	Calc. Ooze	7.0	-	-	-					-	-
4	Basalt	15	A	-	-	TR	S	TR	L	-	-
(5 - 6)	"	0.6 tot.	A	-	Zeolitic amygdules.	40%	S	-	M	Moderately altered.	2 samples total. Vesicular.
(7 - 8)	"	1.0 tot.	A	-	"	10%	C	TR	M	"	2 samples total.
9	"	0.6	A	-	-	TR	C	TR	M	"	Amygdaloidal with the amygdules being filled with calcite.
(10 - 11)	Basalt	0.3 tot.	A	-	Zeolitic amygdules.	10%	C	TR	H	Highly altered.	Vesicular. 2 samples total.
12	"	0.1	A	-	"	2%	S	TR	VH	Extremely altered.	-


OCEANUS 23
LEG 1
2-14 APRIL, 1977
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********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
OCE	23	1	0001	0000	8	77 4 7	18 19.3'N	81 23.0'W	9	45.81	0001	4386.	4386.	30K	16	0000	0	
OCE	23	1	0004	0000	8	77 4 9	17 56.5'N	81 45.0'W	1	45.71	0004	4846.	4943.	30K	16	0000	0	
OCE	23	1	0005	0000	8	77 4 9	17 54.6'N	81 41.0'W	9	45.71	0005	5516.	4346.	39K	16	0000	0	
OCE	23	1	0008	0000	8	77 410	17 51.0'N	81 52.0'W	1	45.71	0008	3268.	3268.	20K	16	0000	0	
OCE	23	1	0009	0000	8	77 410	17 48.2'N	81 54.2'W	9	45.71	0009	5026.	3916.	15K	16	0000	0	
OCE	23	1	0011	0000	8	77 411	18 10.7'N	81 46.0'W	9	45.81	0011	5640.	5420.	45K	16	0000	0	
OCE	23	1	0012	0000	8	77 411	18 5.1'N	81 44.7'W	9	45.81	0012	5667.	5132.	50K	16	0000	0	
OCE	23	1	0013	0000	8	77 412	18 10.4'N	81 37.2'W	9	45.81	0013	4495.	4495.	28K	16	0000	0	
OCE	23	1	0014	0000	8	77 412	18 13.1'N	81 32.2'W	9	45.81	0014	3373.	3373.	20K	16	0000	0	
OCE	23	1	0016	0000	8	77 412	17 53.0'N	81 50.0'W	1	45.71	0016	4123.	3916.	15K	16	0000	0	
OCE	23	1	0017	0000	8	77 413	18 16.9'N	81 51.3'W	9	45.81	0017	3989.	3445.	1K	16	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 1 DREDGE 1 DESCRIBED BY G. Thompson/W. Bryan, H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Weathered Basalt	0.1	F	-	-			1/2	H	-	Infilled cracks. Small cobble size.
2	Palagonite Breccia	0.1	F	-	-			TR	M	Glass to Palagonite.	Fe-Mn staining. Some semi-lithified sediment noted.
3	Basalt	0.2	F	-	-			1/2	L	Altered glassy margins.	Sediment infilled cracks.
4	Basalt	0.3	F	-	-			TR	M	Some altered glass.	Chill margins noted. Coated with semi-lithified sedi-
											ment (1 cm).
5	Palagonitized Breccia	0.1	M	-	-			1	M	Glass to Palagonite.	Coated with semi-lithified sediment with included
											palagonitized glass.
6	Basalt	0.1	F	-	-			1	M	Glass to Palagonite.	Chill margin noted. Sedi-ment infilled cracks.
7	Basalt	0.1	F	-	-			2	M	-	Chill margin noted.
8	Weathered Basalt	0.2	F	-	-				H	Glass margins completely	-
										altered?	
9	Weathered Basalt	0.1	F	-	-			TR	M	Glass to Palagonite.	Chill margins noted. Sedi-ment and debris filled
											crack.
10	Weathered Basalt	0.1	F	-	-			1/2	M	Glass to Palagonite.	Chill margin noted.
11	Weathered Basalt	3.0	F	-	-			1	L	"	"
12	Breccia	2.8	C	Matrix:Carbo-nate mud with	∿65% clasts			TR	M	"	Angular, variably weathered clasts of
				palagonitized glass.							basalt.
13	Breccia	4.0	C	-	-			1	M	-	Increased Fe-Mn crusting and more palagonite.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 1 DREDGE 1 DESCRIBED BY G. Thompson/W. Bryan, H. Dick/P. Andrew DATE 12/13/86

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
14	Basalt	2.5	F	-	-	TR	-	TR	L	Glass to Palagonite	Two chill margins evident with 4-7mm thick palagonite layers.
		STATION:	4		DREDGE: 4						
1	Basalt	2.0	A	-	-				TR	-	Fresh glass.
2	Basalt	0.2	A	-	-				TR	-	Fresh glass.
3	Pillow Basalt	1.2	A	-	3% small Pg.				TR	-	Fresh glass.
4	Pillow Basalt	0.2	A	-	-				TR	-	Fresh glass.
5	Pillow Basalt	0.6	A	-	3% small Pg.	1%			TR	-	Fresh glass.
6	Pillow Basalt	0.2	A	-	-				TR	-	Fresh glass, small fragment
(7-17)	Basalt	10.0 tot.	A	-	-	TR			TR	-	11 samples total. Fresh glass (pillows).
18	Pahoehoe	0.2	A	-	-				TR	-	Texturally distinct basalt.
19	Pillow Basalt Fragments	15.0	A	-	-				TR	-	Glassy. Two bags (A&B).

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 5 DREDGE 5 DESCRIBED BY G. Thompson/W. Bryan, H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	0.5	A	-	-	TR			TR	-	With small spherules (<1mm).
(2-3)	"	4.0	A	-	-	1%			L	-	Two samples total, with fresh glass. Spherules (<1mm).
4	"	6.1	A	-	-			TR	L	-	Spherules (<1mm).
5	"	4.0	F	-	5% large plag. laths.	3%			TR	-	Glassy margins.
6	"	5.0	A	-	-	TR			L	-	Glassy with spherules.
7	"	1.6	A	-	1-2 mm Pg.laths				L	-	Spherulitic at margin.
8	"	0.6	A	-	-	5%			TR	-	Some sediment coatings. Internal cracking noted.
9	"	1.0	A	-	Plag. laths?	TR			TR	-	Largely aphyric.
10	"	0.8	A	-	-				L	Altered rims.	Largely aphyric.
11	Porphyritic Pillow Basalt	0.6	F	-	5% large Pg. laths.	TR			L	-	Some phenocrysts rounded.
12	Pillow Basalt	0.3	A	-	-				TR	-	Fresh basalt.
13	"	0.4	A	-	-	TR			L	-	Fresh basalt.
14	Porphyritic Pillow Basalt	0.8	F	-	2% large Pg laths.				L	-	Some consolidated sediment.
15	Pillow Basalt	0.2	A	-	-	TR			TR	-	2-3 mm wide reaction rim. Some sediment coating.
16	"	0.2	A	-	-	TR			L	-	Some weathered glass.
17	"	0.3	A	-	-				TR	-	Aphyric, fresh basalt.
18	"	0.2	A	-	-	2%			L	-	Less fresh than other sample
19	"	0.2	A	-	1 mm Pg noted?				TR	-	Aphyric, fresh basalt.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 5 DREDGE 5 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
20	Pillow Basalt	0.2	F	-	-				TR	-	Spherulitic?
21	"	0.2	F	-	-				L	-	Spherulitic; reaction rims noted.
22	"	0.2	A		-				TR	-	Aphyric, fresh basalt.
23	Porphyritic Pillow Basalt	0.2	F	-	∿3% Pg-laths.				TR	-	Laths also noted as tabular to subhedral.
24	Basalt	0.2	A	-	-				TR	-	Aphyric, fresh basalt.
25	Breccia	0.2	M	-	Angular to subrounded clasts.				L	-	Hematite veins?
26	Breccia	0.4	M	-	10% subrounded clasts.				L	-	Hematite veins.
27	Basalt	0.2	A	-	-				TR	-	Greenstone?
28	Greenstone	0.2	A	-	-				L	Gr.	Altered cracks, remnant glassy margins.
29	Greenstone	0.2	A	-	Green tabular phenocrysts.				L	Gr.	Basalt to greenstone. Phenocrysts 1-2mm in size.
30	Gabbro	0.2	C	-	Tabular to lath-like Pg.				L	-	Recrystallized texture.
31	Greenstone	0.1	A	-	-				TR	Gr.	Altered basalt.
32	Greenstone	0.2	A	-	-				TR	Gr., remnant glass.	Basalt to greenstone, spherulitic. Infilled crack.
33	Altered Pillow Lava	0.3	F	-	-				TR	Gr.	Epidote vein.
34	Altered Porphyritic Basalt	0.1	F	-	Anhedral.				L	To greenstone.	Weathering rind 2-5 mm.
35	Greenstone	0.1	F	-	-				H	Gr.	Crumbly, weathered breccia?
36	Greenstone	0.1	F	-	-				TR	Gr.	Infilled cracks, altered basalt.
37	Gabbro	0.2	C	-	Some exhibit reaction rims.				L	-	Cracks infilled. Some noted brecciation.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 5 DREDGE 5 DESCRIBED BY G. Thompson/W. Bryan H. Dick/ P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
38	Greenstone	0.2	A	-	-	TR	—	—	L	Gr. altered pillow basalt.	Remnant (<5cm thick) glass matrix. Filled vesicles.
39	"	0.2	F	-	-	—	—	—	TR	"	Infilled cracks. Sediment coating.
40	Greenstone Breccia	0.3	F	Crumbly matrix.	20 mm long, subangular clasts,	—	—	—	L	Gr.	Clasts = serpentine?
41	Greenstone	0.3	A	-	-	TR	—	—	TR	Gr. altered pillow basalt.	Vesicles and cracks filled. Remnant glassy matrix.
42	Greenstone Breccia	0.2	F	Little matrix.	Many subangular clasts.	—	—	—	TR	Gr.	Oxide alteration along edge of clasts.
43	Basalt	0.1	A	-	-	—	—	TR	L	-	Pillow morphology.
44	Pahoehoe	0.4	F	-	-	—	—	—	TR	-	Basalt "ropes" ~5 mm thick, 20 mm long.
45	Pillow Basalt	0.4	A	-	-	—	—	—	TR	-	Fresh glassy surface.
(46-48)	Pillow Basalt	6.0 tot.	A	-	-	TR	—	—	TR	-	3 samples total. Fresh glassy surface.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 8 DREDGE 8 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P.Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Pillow Basalt	2.7	F	-	-	15%	-	TR	L	-	Large vesicles 1-3mm dia.
2	Breccia	1.8	F	70% matrix. Small clasts + Fe-Mn crust.	30% large clasts.	-	-	TR	L	-	Clasts are subangular to angular.
3	Porphyritic Basalt	0.3	F	-	Minor Pg laths, 2-3 mm long.	2%	-	TR	L	-	-
4	Basalt	1.0	F	-	-	TR	-	TR	L	-	Weathered zonation noted.
5	Pillow Basalt	1.4	A	-	-	TR	-	TR	L	Altered glass.	Some cracks show pronounced alteration.
6	Basalt	0.5	A	-	± small Pg.	TR	-	TR	L	-	1-3 mm reaction rim.
(7-9)	Basalt	1.5 tot.	F	-	-	20%	-	TR	L	-	Large (1-2 mm dia.) vesicles 2 samples total.
10	Pillow Basalt	0.1	A	-	-	-	-	TR	M	Altered glass.	-
11	Basalt	0.3	F	-	-	-	-	TR	H	-	Surface crumbles easily.
12	Basalt	0.1	F	-	-	-	-	TR	M	-	"
13	Basalt	0.1	F	-	-	3%	-	TR	L	-	Thin glassy rim?
14	Basalt	0.4	F	-	-	TR	-	TR	M	-	1 cm weathering rind.
15	Porphyritic Basalt	0.7	F	-	∿3% Pg laths, 2-3 mm long.	TR	-	TR	L	Noted alteration.	Very small vesicles.
16	Basalt	0.3	F	-	A few large Pg.	TR	-	TR	L	"	-
(17-19)	Basalt	1.0 tot.	A	-	-	3%	-	TR	L	Slight.	3 samples total. Small vesicles. Weathered throughout.
(20-21)	Porphyritic Basalt	1.2 tot.	F	-	2-3 mm long Pg. (∿2%)	2%	-	TR	L	Slight.	5 mm thick reaction rims. 2 samples total.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 8 DREDGE 8 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(22-27)	Basalt	1.0 tot.	F	-	Small Pg.	TR	-	TR	L	-	6 samples total. Very small vesicles.
28	Basalt	0.7	F	-	-	—	—	TR	L	Alteration noted.	-
29	Semi-lithified sediment	0.3	-	-	-	—	—	—	—	-	Crumbly.
30	Porphyritic Basalt	5.0	A	-	5-10% Pg laths, 1-5 mm long.	—	—	TR	L	-	1-2 mm reaction rim.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 9 DREDGE 9 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	0.9	F	-	-				L	-	-
2	Pillow Basalt	1.0	A	-	-				L	-	-
3	Basalt	1.1	F	-	-				L	_	_
4	Basalt	1.8	F	-	-				L	-	Iron stained.
5	Diabase	0.7	F	-	-				M	-	Rusty weathering. (1cm weathering rind).
6	Basalt	0.5	F	-	-				L	-	-
7	Basalt	1.2	F	-	-				L	-	Fractured.
8	Basalt	0.7	F	-	-				L	-	-
9	Pillow Basalt	0.7	A	-	-				L	-	Exfoliation noted.
10	Basalt	0.7	F	-	-				L	-	-
11	Basalt	0.3	F	-	-				L	-	Slightly fractured.
(12-14)	Basalt	1.8 tot.	F	-	-				L	-	3 samples total.
15	Diabase	0.4	F	-	-				L	-	TR of glass.
(16-19)	Basalt	1.2 tot.	F	-	-				L	-	4 samples total.
20	Basalt	0.3	F	-	-				L	-	1-2 mm weathering rind. Weathered along fractures.
(21-89)	Basalt	12.5 tot.	F	-	-				L	-	69 samples total. Some show pillow morphology.
90	Basalt	0.3	F	-	-				L	-	Grey-green weathering. Fractured.
(91-95)	Basalt	3.5 tot.	F	-	-				L	-	5 samples total.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 11 DREDGE 11 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(1-6)	Lithified Sediment	0.5 tot.	F	-	-	—	—	—	L	Purple weathering.	6 samples total. Very fine equant grains.
(7-12)	Lithified Sediment	0.9 tot.	F	-	-	—	—	—	L	No purple weathering.	"
(13-15)	Lithified Sediment	1.0 tot.	F	-	-	—	—	—	L	-	3 samples total. Larger fragments noted.
(16-21)	Lithified Sediment	0.5 tot.	F	-	-	—	—	—	L	Very purple outer surface.	6 samples total.
(22-27)	Lithified Sediment	0.9 tot.	F	-	-	—	—	—	L	Very purple outer surface.	6 samples total.
(28-30)	Lithified Sediment	0.5 tot.	F	-	-	—	—	—	L	Very purple outer surface.	3 samples total.
(31-32)	Lithified Sediment	0.9 tot.	F	-	-	—	—	—	L	Very purple outer surface.	2 samples total.
(33-34)	Lithified Sediment	0.7 tot.	F	-	-	—	—	—	L	Very purple outer surface.	2 samples total.
(35-36)	Lithified Sediment	0.7 tot.	F	-	-	—	—	—	L	Very purple outer surface.	2 samples total.
37	Lithified Sediment	0.7	F	-	-	—	—	TR	L	Very purple outer surface.	Fe-Mn staining noted.
(38-39)	Lithified Sediment	0.5 tot.	F	-	-	—	—	TR	L	Very purple outer surface.	Fe-Mn staining noted. 2 samples total.
40	Sandstone	2.5	F	-	-	—	—	TR	L	Very purple outer surface.	Shows thin layering, cross-bedding?
41	Sandstone	3.0	F	-	-	—	—	—	L	Purple weathering.	Very similar to previous sediment sample.
(42-51)	Pillow Basalt	2.3 tot.	F	-	-	—	—	—	M	Glass to palagonite.	10 samples total. Remnant glass apparent.
(52-64)	Basalt	2.5 tot.	F	-	-	—	—	TR	M	Some altered glass.	13 samples total. Pahoehoe to pillow-like texture.
65	Basalt	0.5	A	-	-	TR	—	—	L	-	Ropey texture. Edges exhibit foliation.
66	Basalt	0.1	A	-	-	—	—	—	M	-	Ropey texture. Some glass on edges.
67	Basalt	0.3	A	-	-	—	—	—	M	-	Ropey texture. Some parts crumbly.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 11 DREDGE 11 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/13/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
68	Basalt	1.1	A	-	-	—	—	—	L	-	Ropey texture. Some glass.
69	Basalt	1.0	A	-	-	—	—	—	L	-	Some glass, pillow morphology, banding noted.
											Variolitic.
70	Pillow Basalt	0.6	A	-	-	—	—	—	M	-	A few remnant glassy areas noted.
71	Porphyritic Pillow Basalt	6.0	A	-	2 mm long Pg - laths.	TR		—	L	-	Unusual layered structure. Fresh glass noted.
72 (A-J)	Basalt	8.8	A	-	-	—	—	—	L	-	Some fresh glass. Ropey texture.
73	Basalt	-	A	-	-	—	—	—	M	-	"
(74-76)	Basalt	1.0	A	-	-	—	—	—	L	-	3 samples total. Ropey texture. Some glass.
(77-78)	Basalt	1.0	A	-	-	—	—	—	L	-	2 samples total. Ropey texture, some glass.
79	Diabase	-	F	-	Pg - laths.	—	—	—	L	-	4 bands noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 12 DREDGE 12 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/13/86

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	1.4	A	-	-				L	-	Fairly fresh. Some glassy rind.
2	Basalt	1.1	F	-	-				L	-	Fairly fresh.
3	Basalt	1.4	F	-	-			TR	L	Light alteration.	Weathering rind 2-10 mm. Some Fe-Mn staining.
4	Basalt	-	A	-	-			TR	L	"	Weathered glassy rind. Some Fe-Mn staining.
5	Basalt	1.1	A	-	-			TR	L	-	Fe-Mn staining. Fairly fresh basalt.
6	Basalt	1.4	F	-	-				L	Some orange-white mineralization.	Weathering rind 3-6 mm.
7	Basalt	0.7	A	-	-				M	-	Apheric.
8	Basalt	0.7	F	-	Some Pg.				L	-	3-6 mm weathering rind.
9	Basalt	0.7	A	-	-			TR	L	-	Slight Fe-Mn tinting. Apheric.
10	Basalt	0.9	A	-	-				M	-	TR glass on surface.
11	Basalt	1.8	F	-	-				L	-	Slightly weathered.
(12-15)	Basalt	5.0 tot.	F	-	-				L	-	4 samples total.
16	Breccia	4.5	F	-	-				TR	-	Composed of pebble-sized clasts of volcanic glass.
(17-40)	Basalt	22.0 tot.	F	-	-				L	-	23 samples total.
41	Diabase	0.3	F	-	-				TR	-	-
42	Basalt	0.3	F	-	-				L	-	Slightly weathered.
43	Sediment	-	-	-	-					-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 13 DREDGE 13 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/14/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Peridotite	0.1	C	-	-			TR	VH	-	Fe-Mn coating on minerals on surface?
2	Peridotite Tectonite	1.5	C	-	Rounded Opx-3mm across. Anhedral Cpx.			TR	H	Ol to serp. + Fe-Mn minerals.	Well foliated.
3	Peridotite Tectonite	1.2	C	-	~20 Px grains 1-10 mm in size.			TR	M	-	En enchelon cracks parallel weak foliation.
4	"	1.6	C	-	Large Px.			TR	M	Weathered Ol.	Large filled cracks ~45° to foliation.
5	Peridotite	2.3	C	-	Large crumbly Px ~ 10% of rock.			TR	VH	Serpentinized matrix.	Heavy Mn coating. Moderate to weak foliation.
6	Peridotite Tectonite	1.9	C	-	Elongate and rounded Px grain.			TR	H	-	Moderate foliation. Filled veins. Secondary crystal growth on surface.
7	Peridotite Tectonite	1.1	C	-	Px - grains.			TR	M	Serpentinized matrix.	Foliated.
8	Peridotite	0.2	C	Orange matrix	40% Opx and Cpx, round to elongate.			TR	M	Serpentinized olivine.	Numerous thin dark veins.
9	Peridotite	0.2	C	Orange matrix.	10% Px. 1-2 mm long.			TR	VH	Serpentinized olivine.	8mm wide infilled crack noted.
10	Peridotite Tectonite	1.0	C	-	5mm long Px.			TR	VH	-	Foliated.
11	"	-	C	Orange matrix.	20%-Px. Rounded to elongate.			TR	M	-	Foliated.
12	"	0.68	C	"	2mm long anhedral grains.			TR	VH	-	Crumbly. Weak foliation.
(13-18)	"	0.9 tot.	C	"	1-5mm Px grains.			TR	M	-	6 samples total. ± dark chromite grains. Weak grain alignments.
(19-23)	Peridotite Tectonite	1.0 tot.	C	Dark matrix.	Large elongate Ol-rimming Px.			TR	M	-	5 samples total.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 13 DREDGE 13 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/14/86

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
(24-32)	Peridotite Tectonite	2.3 tot.	C	-	2-5mm Px. 5-10%.	—	—	TR	M	Severely weathered. Ol serpentinized.	9 samples total.
(33-45)	Peridotite	2.4 tot.	C	-	Rounded Px + Ol?	—	—	0.5	M	Weathered Px.	13 samples total. Notable Mn coating.
46	Peridotite Tectonite	1.8	C	Orange matrix.	15% Px grains. 1-3 mm, rounded.	—	—	TR	VH	-	Filled polygonal shaped veins.
47	Ultramafic	1.3	F	-	A few 10mm long Px grains.	—	—	TR	L	-	Some large opaque with metallic luster.
48	Olivine gabbro	1.1	C	-	-	—	—	TR	M	-	Fe-Mn staining.
49	Olivine Tectonite	0.7	C	-	Notable Ol.	—	—	TR	M	-	-
50	Peridotite	6.0	C	-	15% large Px grains.	—	—	0.5	H	-	Thick Fe-Mn crust. Infilled cracks noted.
51	Peridotite Tectonite	3.4	C	-	10% large weathered px.	—	—	TR	M	Serpentinized.	Infilled cracks noted.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 14 DREDGE 14 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/14/84

Sample #	Lithology	Wt.	G. S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Peridotite	1.0	C	-	Px - grains.	—	—	TR	M	-	-
2	"	1.4	C	-	Coarse Px grains.	—	—	—	M	Serpentinized.	-
3	Serpentinite	1.7	-	-	-	—	—	—	—	-	-
4	Peridotite	2.8	C	-	Relic Px.	—	—	TR	H	Serpentinized.	Foliated.
5	Serpentinite	2.7	-	-	Relic Px.	—	—	TR	-	-	Breccia like with large sub-angular clasts.
6	Serpentinite	0.2	-	-	Relic Px.	—	—	—	—	-	-
7	Serpentinite	0.7	-	-	Noted Px.	—	—	—	—	-	-
8	Serpentinite	0.3	-	-	Large relic Px.	—	—	TR	-	-	Slightly tectonized.
9	Serpentinite	0.3	-	-	Weathered Px.	—	—	—	—	-	Tectonite with weak foliation.
(10-12)	Serpentinite	1.1 tot.	-	-	With relic Px.	—	—	—	—	-	3 samples total.
13	Serpentinite	0.2	-	-	A few relic Px.	—	—	—	—	-	-
14	Serpentinite	0.2	-	-	A few relic Px.	—	—	—	—	-	Weak foliation.
15	Serpentinite	0.1	-	-	Large relic Px.	—	—	—	—	-	-
16	Peridotite	-	C	-	Px?	—	—	—	M	Serpentinized.	-
17	Breccia	1.5	C	-	Ultramafic clasts.	—	—	TR	L	-	Clasts reach cobble size.
18	Serpentinite	1.2	-	-	-	—	—	TR	-	-	-
19	Serpentinite	0.5	-	-	With relic Px.	—	—	—	—	-	-
20	Serpentinite	0.5	-	-	Lots of small relic Px.	—	—	TR	-	-	-

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 14 DREDGE 14 DESCRIBED BY G. Thompson/W. Bryan, H. Dick/P. Andrew DATE 12/17/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
21	Peridotite	0.4	C	-	Large Px grains.	—		TR	M	Serpentinized.	-
22	Breccia	0.5	C	-	Mafic and ultra-mafic clasts.	—		TR	L	-	Clasts reach cobble size.
23	Serpentinite	0.5	-	-	With relic Px.	—	—	—	-	-	-
24	Peridotite	0.5	C	-	-	—	—	—	M	Serpentinized.	Foliated.
25	Pyroxene in white matrix	0.3	C	-	-	—	—	—	M	-	-
26	Peridotite	0.2	C	-	Px.	—		TR	H	Serpentinized.	Foliated.
27	Serpentinite	0.2	-	-	With relic Px.	—		TR	-	-	With slickensides.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 1 /17/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Breccia	0.1	C	Mud matrix.	Basalt and glass clasts.				VH	-	Clasts up to 2-5 cm in size. Glass severely weathered.
2	Basalt	1.5	F	-	-	1%			L	-	Vuggy.
3	Basalt	1.0	-	-	-	1%			L	-	Vuggy. Vesicles 1mm in dia.
4	Basalt	1.5	F	-	-				L	-	-
5	Breccia	0.1	C	Mud matrix.	Basalt and weathered glass clasts.				H	-	Clasts range from several cm down to mm.
6	Basalt	0.1	F	-	-				M	-	-
7	Basalt	0.3	F		-				M	-	Angular.
8	Basalt	0.2	F	-	-	TR			L	-	Angular. Some vesicles up to 1 mm dia.
9	Basalt	0.1	F	-	-				M	-	-
10	Pillow Basalt	0.2	A	-	-					-	Spherulites on pillow surface.
11	Pillow Basalt	0.3	A	-	-				M	-	Glassy surface.
12	Pillow Basalt	0.1	A	-	-				L	-	50% glass.
13	Basalt	0.5	F	-	-	2%			M	-	-
14	Pillow Basalt	0.5	F	-	-				M	-	Glassy surface.
15	Basalt	0.5	F	-	-	10%			L	-	Vuggy.
16	Basalt	0.7	F	-	-				M	-	Subangular.
17	Pillow Basalt	0.6	A	-	-				M	-	Spherulites near pillow margin.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson/W. Bryan, H. Dick/P. Andrew DATE 12/17/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
18	Pillow Basalt	1.4	A	-	-	2%			L	-	Glassy margins.
(19-20)	Basalt	2.3 tot.	F	-	-				M	-	2 samples total.
21	Basalt	0.5	F	-	-	1%			M	-	Spherulites present.
22	Pillow basalt	1.1	A	-	-				M	-	Glassy surface.
23	Basalt	1.6	F	-	-				M	-	Subangular.
(24-25)	Basalt	0.2 tot.	F	-	-				M	-	2 samples total. Small chips of basalt.
26	Basalt	0.3	F	-	-	TR			M	-	With spherulites.
27	Basalt	0.1	F	-	-				M	-	Angular fragments with calcareous crust.
28	Basalt	0.1	F	-	-				M	-	-
29	Basalt	0.9	F	-	-				M	-	Angular
30	Basalt	2.0	F	-	-	TR			M	-	-
31	Pillow Basalt	0.3	F	-	-	1%			M	-	Weathered glassy rind (1-5 mm thick).
32	Basalt	1.0	F	-	-				M	-	Angular.
33	Basalt	0.7	F	-	-				L	-	-
34	Pillow Basalt	2.0	A	-	-				L	-	With glassy rind (1-5 mm) and spherulites.
35	Pillow Basalt	2.5	A	-	-	TR			M	-	Spherulites. No glass.
36	Basalt	1.8	F	-	-				L	-	Subangular.
37	Basalt	2.3	A	-	-				M	-	TR glass on surface.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/17/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
38	Basalt	0.9	A	-	-	—	—	—	M	Weathered glass.	Angular. Weathered glass on pillow surface.
39	Basalt	0.2	F	-	-	—	—	—	M	-	-
40	Basalt fragments	1.0 tot.	F	-	-	—	—	—	M	-	8 fragments total.
41	Basalt Glass	0.1	A	-	-	—	—	—	M	-	Notably weathered.
42	Basalt	1.4	F	-	-	3%	—	—	M	-	Vesicles 1-2 mm in dia.
43	Pillow Basalt	2.5	A	-	-	—	—	—	M	-	Glass margins with spherulites.
44	Basalt	1.1	F	-	-	—	—	—	M	-	Subangular, vuggy texture on surface.
45	Pillow Basalt	1.6	A	-	-	2%	—	—	L	-	Fragments glassy. Vesicles <1mm.
46	Pillow Basalt	3.7	A	-	-	—	—	—	M	—	Little glass, some spherulites.
47	Pillow Basalt	0.9	A	-	-	—	—	—	M	-	Little glass.
48	Pillow Basalt	0.9	A	-	-	—	—	—	M	-	-
49	Pillow Basalt	1.6	A	-	-	TR	—	—	L	-	With large "pillow like" glass surface and spherulites.
50	Pillow Basalt	2.5	A	-	-	—	—	—	M	-	~10% glass on surface. With spherulite perimeter.
51	Basalt	1.0	F	-	-	1%	—	—	M	-	Vuggy, subangular.
52	Basalt	1.1	A	-	-	—	—	—	M	-	Angular, remnant glass.
53	Basalt	2.7	F	-	-	1%	—	—	M	-	Vuggy.
54	Basalt Fragments	1.4 tot.	A	-	-	1%	—	—	M	-	6 samples total. Some have glass, some have calcareous coating.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson/W. Bryan, H. Dick/P. Andrew DATE 12/17/84

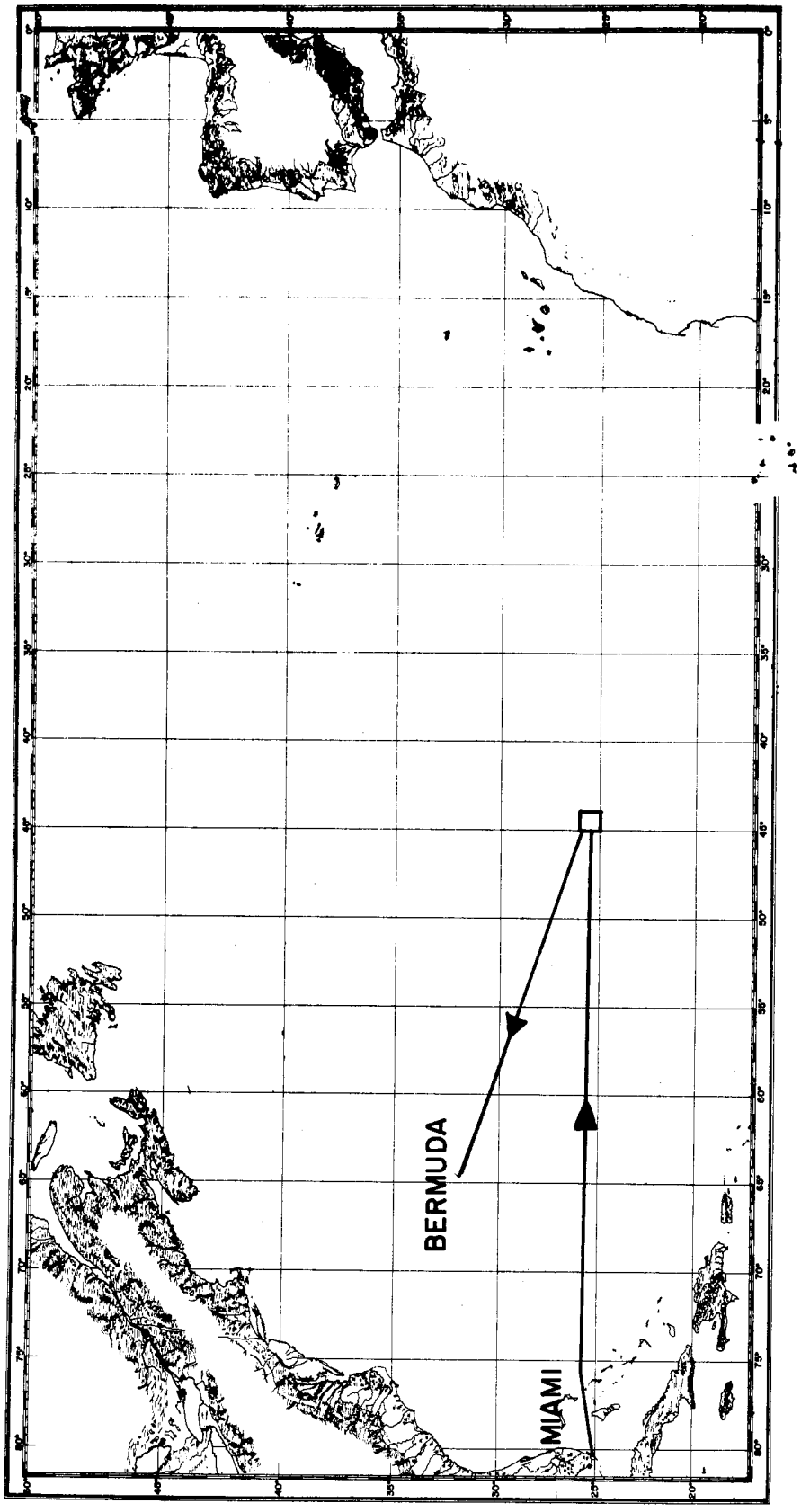
Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
55	Basalt	1.1	F	-	-	2%			L	-	Angular.
56	Basalt Fragment	0.5 tot.	F	-	-				L	-	5 samples total.
57	Basalt	0.1	F	-	-	1%			M	-	Some glass. Weathering = small black dots on green surface.
58	Basalt	0.2	F	-	-				M	-	Glassy, fractured.
(59-61)	Basalt	4.5 tot.	F	-	-	TR			M	-	Angular. 3 samples total.
62	Pillow Basalt	0.7	A	-	-				M	-	Notable glass.
63	Pillow Basalt	4.5	A	-	-				M	-	Spherulitic perimeter.
64	Pillow Basalt	4.5	A	-	-				M	-	Glass and spherulites.
65	Pillow Basalt	4.5	A	-	-				M	-	Thick, rough, glassy surface.
66	Basalt	4.5	F	-	-				M	-	Angular.
67	Basalt	1.4	A	-	-				M	-	With remnant glassy surface.
68	Basalt	7.3	F	-	-	1%			M	-	Angular.
69	Basalt	6.0	A	-	-				M	-	Rough glassy surface.
70	Basalt	32.5	A	-	-				M	-	-
(71-74)	Basalt Fragments	1.4 tot.	F	-	-				M	-	4 samples total.
(75-80)	Basalt	2.0 tot.	A	-	-				M	-	6 samples total. With glassy surfaces.
81	Basalt Fragments	0.5 tot.	F	-	-				M	-	3 samples total. 1 with glass

WHOI ROCK SAMPLE DESCRIPTION

CRUISE OCE 23 STATION 16 DREDGE 16 DESCRIBED BY G. Thompson/W. Bryan H. Dick/P. Andrew DATE 12/17/84

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
82	Basalt Fragments	-	F	-	-	1%	—		M	-	-
83	Basalt Fragments	-	A	-	-	—	—		M	-	Glassy.
84	Basalt	4.5	F	-	-	—	—		M	-	Angular.
85	Basalt	2.7	A	-	-	—	—		M	-	Angular, with glassy surface
86	Basalt	1.4 tot.	A	-	-	—	—		M	-	2 samples total. 1 with glassy surface. Angular.
87	Basalt	-	F	-	-	TR	—		M	-	Angular, glassy, with spherulites.
88	Pillow Basalt	0.5	A	-	-	—	—		M	-	Glassy pillow surface.
		STATION:		17	DREDGE: 17						
1	Serpentine Breccia	0.2	C	Carbonate rich clay matrix.	Serpentine clasts.	—	—		L	-	Sharp angular clasts of serpentine with clay matrix.
2	Breccia	0.1	C	-	Plagioclase?	TR	TR	—	L	-	Metamorphosed, zeolites, serpentine.

RESEARCHER 300
LEG I
JULY 1982



********** STATION DATA RETRIEVAL ********** PAGE
********** DATE: 8-DEC-86 14:40 ********** **WHOI**

SHIP	CRUISE	LEG	STATION	SAMPLE NUMBER	DE-VICE	DATE YRMODA	LATITUDE	LONGITUDE	FIX TYPE	MARS-DEN SQUARE	CORE OR DREDGE NUMBER	DEPTH	CORE LENGTH OR END DEPTH	DREDGE OR SAMPLE WEIGHT	PHYSIO-GRAPHIC PROV.	ROCK OR SED. TYPE	VITA CODE	REMARKS
RES	782	1	0002	0000	8	82 717	26 6.9'N	44 51.3'W	9	77.64	0002	4047.	3860.	235K	16	0000	0	
RES	782	1	0003	0000	8	82 718	26 6.2'N	44 43.6'W	9	77.64	0003	2350.	2630.	600G	15	0000	0	
RES	782	1	0004	0000	8	82 719	26 6.4'N	44 43.9'W	9	77.64	0004	2350.	2070.	130K	15	0000	0	

WHOI ROCK SAMPLE DESCRIPTION

CRUISE TAG Researcher STATION 2 DREDGE 2 DESCRIBED BY D. Graham DATE 7/17/82

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	10.75	F	-	-	——		TR	M	Glass to palagonite.	Glass + palagonitized glass over outer 25% surface; red stained.
2	Basalt	10.8	F	-	-	——		TR	M	Glass to palagonite.	Glass over outer surface, red stained.
3	Basalt	10.7	A	-	-	——		TR	M	"	"
4	Basalt	6.5	F	-	-	——		TR	M	"	Some glass over outer surface, red stained.
5	Basalt	7.3	F	-	-	TR	-	TR	M	"	Some glass over outer surface; red stained.
6	Basalt	5.7	A	-	-	——		TR	M	"	Some glass over outer surface; red stained. Almost all glass gone.
7	Basalt	6.0	F	-	-	——		TR	M	Glass to palagonite.	Some fresh glass present, red stained.
8	Basalt	5.0	A	-	-	——		TR	M	"	Very little glass, red stained.
9	Basalt	4.5	F	-	-	——		TR	M	"	All glass gone, some red stain.
10	Basalt	4.0	F	-	-	——		TR	M	"	Little glass left, red stain.
11	Basalt	3.5	A	-	-	TR	-	<1	M	"	Very little glass, red stain. Some Mn coating.
12	Basalt	2.5	F	-	-	——		TR	M	"	Some glass, red stain.
13	Basalt	2.0	F	-	-	——		TR	M	"	Some glass, red stain.
14	Basalt	1.5	F	-	-	3%	-	<1	M	"	Very little glass, red stain. Mn stained.
15	Basalt	2.5	F	-	-	1%	-	TR	M	"	Some glass, red stain.
16	Basalt	7.3	F	-	-	——		TR	M	"	Glass over outer surface, some red stain.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE TAG Researcher STATION 2 DREDGE 2 DESCRIBED BY D. Graham DATE 7/17/82

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
17	Basalt	>15	A	-	-	——		TR	M	Glass to palagonite.	Glass over ∿25% outer surface, palagonite stained.
18	Basalt	10.0	F	-	-	——		TR	M	"	Palagonitized glass over 20% outer surface, red stained.
19	Basalt	8.0	A	-	-	——		TR	M	Glass to palagonite.	Glass, palagonite ∿25% outer surface, red stain.
20	Basalt	6.0	F	-	-	——		TR	M	"	Little glass, palagonite.
21	Basalt	5.5	A	-	-	——		TR	M	"	All glass is palagonitized. Very little glass.
22	Basalt	2.0	F	-	-	——		TR	M	"	Very little glass; palagonite present.
23	Basalt Fragments	6.1 tot.	F	-	-	——		TR	M	"	8 samples total. Very little glass; palagonite present.
24	Basalt Fragments	4.2 tot.	F	-	-	——		TR	M	Glass to palagonite.	34 samples total. Very little glass; palagonite present.
25	Basalt	0.6	F	-	Plag. - TR.	10%	-	TR	M	-	No glass. Least fresh of all samples in dredge.
26	Basalt	1.7	F	-	Plag. - TR.	10%	-	1	M	Glass to palagonite.	No glass; Mn coating in one section.
27	Basalt	3.0	F	-	Plag. - TR.	5%	-	TR	M	"	Glass outer rim; some palagonite, staining.
28	Basalt	>15	F	-	-	TR	-	1	M	"	Crack filled in with MnO; glass palagonitized, red stain.
29	Basalt	5.7	F	-	-	——		TR	M	Glass to palagonite.	Little glass, red stain.
30	Basalt	4.8	F	-	-	——		TR	M	"	Little glass left, all palagonitized.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE TAG Researcher STATION 2 DREDGE 2 DESCRIBED BY D. Graham DATE 7/17/82

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
31	Basalt	7.8	F	-	-	——		TR	M	Glass to palagonite.	Glass, palagonite on two sides.
32	Basalt	6.5	A	-	-	——		TR	M	"	Glass, palagonite on one side, red stain.
33	Basalt	3.0	F	-	-	——		TR	M	"	Very little glass, red stain, chalk(?) coating.
34	Basalt	4.0	F	-	-	——		TR	M	"	Some glass, palagonite, red stain, mild chalk(?) coating.
35	Basalt Fragments	13.0 tot.	F	-	-	——		TR	M	Glass to palagonite.	7 samples total. With palagonite, red stain.
36	Basalt Fragments	4.5 tot.	F	-	-	——		TR	M	-	Most samples no glass (15). Some red staining.
37	Basalt Fragments	1.0 tot.	A	-	-	——		TR	M	Glass to palagonite.	21 samples total. Very little glass.
38	Basalt	*3.4	F	-	Plag. - TR.	5%	-	TR	M	-	No glass, no palagonite.
39	Basalt	*3.1	F	-	Plag. - TR.	5%	-	TR	M	Glass to palagonite.	Little glass, red stained.
40	Basalt Fragments	3.0	A	-	-	——		TR	M	"	35 samples total. Mostly glassy fragments.
41	Basalt glass	0.5	G	-	-	——		TR	M	"	Glass fragments.
* - Slab											

WHOI ROCK SAMPLE DESCRIPTION

CRUISE TAG Researcher STATION 3 DREDGE 3 DESCRIBED BY G. Thompson DATE 7/18/82

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	200g	A	-	-			<1	M	-	Small angular basalt fragment.
2	Lithified Sediment	400g	-	-	-					-	Brownish lithified ooze - 2 pieces.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE TAG Researcher STATION 4 DREDGE 4 DESCRIBED BY D. Graham DATE 7/19/82

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
1	Basalt	>13	F	-	TR - Pg.	——		0.5	M	Glass to palagonite.	Palagonite, red stain, some Mn coating.
2	Basalt	>13	F	-	-	——		2.0	M	-	Botryoidal Mn coating in places. No palagonite.
3	Basalt	6.4	F	-	-	——		2.0	M	Glass to palagonite.	Botryoidal Mn, palagonite, red stain.
4	Basalt	6.0	A	-	-	——		1-2	M	-	Mn coating, no palagonite.
5	Basalt	4.7	F	-	-	——		1-2	M	-	Mn coating, no palagonite.
6	Basalt	1.5	F	-	12% - Pg.	-	0	1.0	M	Glass to palagonite.	Mn coating, Pg feldspars internal and external, stained red.
7	Basalt	2.4	F	-	-	TR	TR	1.0	M	-	Mn coating over external portion. Pg-feldspar crystals, hydration, red stain.
8	Basalt	3.1	F	-	5% - Pg.	——		TR	M	Glass to palagonite.	Palagonite, feldspar phenocrysts, coral attached; may have been lava flow tube.
9	Basalt	3.6	F	-	-	TR	-	1.0	M	-	Portions Mn coated.
10	Basalt	3.7	F	-	5% - Pg.	——		1.0	M	Glass to palagonite.	Palagonite, Mn coated.
11	Basalt	5.2	F	-	-	——		<1	M	"	Palagonite, Mn coating; red stained.
12	Basalt	4.8	F	-	10% - Pg.	——		TR	M	"	Palagonite, Mn coating.
13	Basalt	3.5	F	-	Noted Pg.	——		TR	M	"	Palagonite, Mn coating.
14	Basalt	4.2	A	-	10% - Pg.	——		TR	M	"	Palagonite, Mn coating.
15	Basalt	2.4	A	-	15% - Pg.	——		TR	M	"	Palagonite, Mn coating.

WHOI ROCK SAMPLE DESCRIPTION

CRUISE TAG Researcher STATION 4 DREDGE 4 DESCRIBED BY D. Graham DATE 7/19/82

Sample #	Lithology	Wt.	G.S.	Mineralogy	Phenocrysts	Ve	Am	Mn	We	Alteration	Remarks
16	Basalt	2.5	F	-	15% - Pg.			TR	M	Glass to palagonite.	Palagonite, Mn coating; red stained.
17	Basalt	2.3	F	-	3% - Pg.			TR	M	"	Palagonite, Mn coating; red stained.
18	Basalt	2.7	F	-	-			<1	M	-	No palagonite, no stain, thin Mn coating.
19	Basalt	2.3	F	-	-			<1	M	-	No palagonite, no stain, thin Mn coating.
20	Basalt	3.0	F	-	-			<1	M	-	No palagonite, no stain, thin Mn coating; little glass.
21	Basalt	1.9	A	-	-			<1	M	-	No palagonite, no stain, thin Mn coating.
22	Basalt	2.3	F	-	-			TR	M	-	No palagonite, no stain, thin Mn coating.
23	Basalt	3.5	F	-	-			1	M	Glass to palagonite.	-
24	Basalt	4.3	F	-	TR - Pg.			1-2	M	"	Coral noted.
25	Basalt	2.8	F	-	-			1-2	M	-	No palagonite, no stain, thin Mn coating.
26	Basalt	3.0	A	-	-	1%	-	2	M	-	No palagonite, no stain, thin Mn coating.
27	Basalt Fragments	-	F	-	Pg - noted.			TR	M	Glass to palagonite.	~70 hand specimens, w/Mn coating, some palagonitized
28	Basalt Fragments	-	F	-	Pg - noted.			TR	M	"	12 samples, with palagonite Mn coating.

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16. Abstract (Limit: 200 words)

This report is Volume II in the series of reports entitled **"Descriptions of WHOI Rock Dredge Samples".** This volume represents the final step in the major effort to catalog and prepare initial descriptions for all rock dredge samples in the W.H.O.I. Sea Floor Samples Collection, and to distribute this information throughout the scientific community. The distribution of this report completes the initial description of the backlog of W.H.O.I. Dredge Samples. The data contained in this volume is an accumulation and transcription of initial descriptions made at sea, along with post-cruise descriptions performed at the lab by the curatorial staff.

Volume II contains individual stations executed during the period 1963 through 1986. It also presents a digitized listing of all dredge station data for the entire W.H.O.I. Dredge Collection through 1986. The data are sorted by Marsden Squares and can serve as a regional index for all rock descriptions included in Volumes I-III.

17. Document Analysis a. Descriptors

1. Dredges
2. Rocks
3. Deep Sea Rock Dredge Descriptions

b. Identifiers/Open-Ended Terms

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